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$%^STN;HighlightOn=  ***;HighlightOff=***  ;

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LOGINID:SSPTAPEZ1617

PASSWORD:
TERMINAL (ENTER 1, 2, 3, OR ?):2


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 NEWS  2  APR 04  STN AnaVist, Version 1, to be discontinued
 NEWS  3  APR 15  WPIDS, WPINDEX, and WPIX enhanced with new
                  predefined hit display formats
 NEWS  4  APR 28  EMBASE Controlled Term thesaurus enhanced
 NEWS  5  APR 28  IMSRESEARCH reloaded with enhancements
 NEWS  6  MAY 30  INPAFAMDB now available on STN for patent family
                  searching
 NEWS  7  MAY 30  DGENE, PCTGEN, and USGENE enhanced with new homology
                  sequence search option
 NEWS  8  JUN 06  EPFULL enhanced with 260,000 English abstracts
 NEWS  9  JUN 06  KOREAPAT updated with 41,000 documents
 NEWS 10  JUN 13  USPATFULL and USPAT2 updated with 11-character
                  patent numbers for U.S. applications
 NEWS 11  JUN 19  CAS REGISTRY includes selected substances from
                  web-based collections
 NEWS 12  JUN 25  CA/CAplus and USPAT databases updated with IPC
                  reclassification data
 NEWS 13  JUN 30  AEROSPACE enhanced with more than 1 million U.S.
                  patent records
 NEWS 14  JUN 30  EMBASE, EMBAL, and LEMBASE updated with additional
                  options to display authors and affiliated
                  organizations
 NEWS 15  JUN 30  STN on the Web enhanced with new STN AnaVist
                  Assistant and BLAST plug-in
 NEWS 16  JUN 30  STN AnaVist enhanced with database content from EPFULL
 NEWS 17  JUL 28  CA/CAplus patent coverage enhanced
 NEWS 18  JUL 28  EPFULL enhanced with additional legal status
                  information from the epoline Register
 NEWS 19  JUL 28  IFICDB, IFIPAT, and IFIUDB reloaded with enhancements
 NEWS 20  JUL 28  STN Viewer performance improved
 NEWS 21  AUG 01  INPADOCDB and INPAFAMDB coverage enhanced
 NEWS 22  AUG 13  CA/CAplus enhanced with printed Chemical Abstracts
                  page images from 1967-1998
 NEWS 23  AUG 15  CAOLD to be discontinued on December 31, 2008
 NEWS 24  AUG 15  CAplus currency for Korean patents enhanced
 NEWS 25  AUG 25  CA/CAplus, CASREACT, and IFI and USPAT databases
                  enhanced for more flexible patent number searching
 NEWS 26  AUG 27  CAS definition of basic patents expanded to ensure
                  comprehensive access to substance and sequence
```

information

NEWS EXPRESS JUNE 27 08 CURRENT WINDOWS VERSION IS V8.3,
AND CURRENT DISCOVER FILE IS DATED 23 JUNE 2008.

NEWS HOURS STN Operating Hours Plus Help Desk Availability
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NEWS IPC8 For general information regarding STN implementation of IPC 8

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* * * * * * * * * * * * * * * * STN Columbus * * * * * * * * * * * * * * * *

FILE 'HOME' ENTERED AT 10:37:38 ON 08 SEP 2008

=> file reg
COST IN U.S. DOLLARS SINCE FILE ENTRY TOTAL SESSION
FULL ESTIMATED COST 0.21 0.21

FILE 'REGISTRY' ENTERED AT 10:37:51 ON 08 SEP 2008
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STRUCTURE FILE UPDATES: 7 SEP 2008 HIGHEST RN 1047406-12-1
DICTIONARY FILE UPDATES: 7 SEP 2008 HIGHEST RN 1047406-12-1

New CAS Information Use Policies, enter HELP USAGETERMS for details.

TSCA INFORMATION NOW CURRENT THROUGH July 5, 2008.

Please note that search-term pricing does apply when conducting SmartSELECT searches.

REGISTRY includes numerically searchable data for experimental and predicted properties as well as tags indicating availability of experimental property data in the original document. For information on property searching in REGISTRY, refer to:

http://www.cas.org/support/stngen/stndoc/properties.html

=>
Uploading C:\Program Files\STNEXP\Queries\10542351.str

L1 STRUCTURE UPLOADED

```
=> d l1
L1 HAS NO ANSWERS
L1              STR
/ Structure 1 in file .gra /


Structure attributes must be viewed using STN Express query preparation.


=> s l1
SAMPLE SEARCH INITIATED 10:38:13 FILE 'REGISTRY'
SAMPLE SCREEN SEARCH COMPLETED -      105 TO ITERATE

100.0% PROCESSED      105 ITERATIONS                                0 ANSWERS
SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS:  ONLINE  **COMPLETE**
                        BATCH   **COMPLETE**
PROJECTED ITERATIONS:         1486 TO     2714
PROJECTED ANSWERS:               0 TO        0

L2            0 SEA SSS SAM L1

=> s l1 sss ful
FULL SEARCH INITIATED 10:38:23 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED -     2279 TO ITERATE

100.0% PROCESSED     2279 ITERATIONS                                2 ANSWERS
SEARCH TIME: 00.00.01

L3            2 SEA SSS FUL L1

=> file cap
COST IN U.S. DOLLARS                              SINCE FILE      TOTAL
                                                       ENTRY    SESSION
FULL ESTIMATED COST                                   178.36     178.57

FILE 'CAPLUS' ENTERED AT 10:38:26 ON 08 SEP 2008
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strictly prohibited.

FILE COVERS 1907 - 8 Sep 2008  VOL 149 ISS 11
FILE LAST UPDATED: 7 Sep 2008  (20080907/ED)

Caplus now includes complete International Patent Classification (IPC)
```

reclassification data for the second quarter of 2008.

Effective October 17, 2005, revised CAS Information Use Policies apply.
They are available for your review at:

http://www.cas.org/legal/infopolicy.html

=> s l3
L4 2 L3

=> d l4 1-2 ibib abs hitstr

L4 ANSWER 1 OF 2 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 2004:633527 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 141:174078
TITLE: Preparation of thienylpyridinecarbonitriles as bacterial enoyl-ACP reductase (FabI) inhibitors.
INVENTOR(S): Moir, Donald T.; Xiang, Yibin; Arvanites, Anthony C.; Ali, Syed Masarrat; Geng, Bolin; Ashwell, Mark A.; Orgueira, Hernan Antonio
PATENT ASSIGNEE(S): Genome Therapeutics Corporation, USA; Arqule
SOURCE: PCT Int. Appl., 54 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.		DATE
WO 2004064837	A1	20040805	WO 2004-US1327		20040116
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ					
US 20070027190	A1	20070201	US 2006-542351		20060807
PRIORITY APPLN. INFO.:			US 2003-441411P	P	20030117
			WO 2004-US1327	W	20040116

OTHER SOURCE(S): MARPAT 141:174078
GI

/ Structure 2 in file .gra /

AB Title compds. I [R1, R2 = (un)substituted monocyclic aryl, heteroaryl; Y = X1-X2; X1 = bond, (un)substituted alkylene; X2 = aryl, heteroaryl, cycloaliph., etc.] and their pharmaceutically acceptable salts were prepd. For example, condensation-annulation of 1,3-di-2-thienyl-2-propen-1-one and 2-cyanoethanethioamide, followed by 4-(bromomethyl)benzoic acid S-alkylation of the resulting thioxopyridinecarbonitrile (no data provided), afforded claimed thienylpyridinecarbonitrile II. In methicillin-resistant Staphylococcus aureus minimal inhibitory concn. (MIC) assays, 14-examples of compds. I exhibited MIC values ranging from 0.75->64 .mu.g/mL, e.g., the MIC value of thienylpyridinecarbonitrile II

was 4 .mu.g/mL. Compds. I are claimed useful for the. Of note, compds. I are proposed to inhibit bacterial enoyl-ACP reductase (FabI), a NADH-dependent enoyl [acyl carrier protein] reductase enzyme in the fatty acid biosynthesis pathway.

IT ***340808-61-9P***
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of thienylpyridinecarbonitriles as bacterial enoyl-ACP reductase (FabI) inhibitors.)

RN 340808-61-9 CAPLUS

CN Benzoic acid, 4-[[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]methyl]- (CA INDEX NAME)

/ Structure 3 in file .gra /

REFERENCE COUNT: 3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 2 OF 2 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2004:374624 CAPLUS <<LOGINID::20080908>>

DOCUMENT NUMBER: 141:239652

TITLE: Identification and characterization of inhibitors of bacterial enoyl-acyl carrier protein reductase

AUTHOR(S): Ling, Losee L.; Xian, Jun; Ali, Syed; Geng, Bolin; Fan, Jun; Mills, Debra M.; Arvanites, Anthony C.; Orgueira, Hernan; Ashwell, Mark A.; Carmel, Gilles; Xiang, Yibin; Moir, Donald T.

CORPORATE SOURCE: Genome Therapeutics Corporation, Waltham, MA, 02453, USA

SOURCE: Antimicrobial Agents and Chemotherapy (2004), 48(5), 1541-1547
CODEN: AMACCQ; ISSN: 0066-4804

PUBLISHER: American Society for Microbiology

DOCUMENT TYPE: Journal

LANGUAGE: English

AB Bacterial enoyl-acyl carrier protein reductase (ENR) catalyzes an essential step in fatty acid biosynthesis. ENR is an attractive target for narrow-spectrum antibacterial drug discovery because of its essential role in metab. and its sequence conservation across many bacterial species. In addn., the bacterial ENR sequence and structural organization are distinctly different from those of mammalian fatty acid biosynthesis enzymes. High-throughput screening to identify inhibitors of Escherichia coli ENR yielded four structurally distinct classes of hits. Several members of one of these, the 2-(alkylthio)-4,6-diphenylpyridine-3-carbonitriles ("thiopyridines"), inhibited both purified ENR (50% inhibitory concn. [IC50] = 3-25 .mu.M) and the growth of Staphylococcus aureus and Bacillus subtilis (MIC = 1-64 .mu.g/mL). The effect on cell growth is due in part to inhibition of fatty acid biosynthesis as judged by inhibition of incorporation of [14C]acetate into fatty acids and by the increased sensitivity of cells that underexpress an ENR-encoding gene (4-8-fold MIC shift). Synthesis of a variety of compds. in this chem. series revealed a correlation between IC50 and MIC, and the results provided initial structure-activity relationships. Preliminary structure-activity relationships, potency on purified ENR, and activity on bacterial cells indicate that members of the thiopyridine chem. series are

effective fatty acid biosynthesis inhibitors suitable for further antibacterial development.

IT ***340808-61-9*** , GTC 004061 ***750595-50-7*** , GTC 343131
RL: BSU (Biological study, unclassified); BIOL (Biological study)
(inhibitors of bacterial enoyl-acyl carrier protein reductase)

RN 340808-61-9 CAPLUS
CN Benzoic acid, 4-[[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]methyl]- (CA INDEX NAME)

/ Structure 4 in file .gra /

RN 750595-50-7 CAPLUS
CN Benzoic acid, 4-[1-[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]ethyl]- (CA INDEX NAME)

/ Structure 5 in file .gra /

REFERENCE COUNT: 26 THERE ARE 26 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

=> logoff
ALL L# QUERIES AND ANSWER SETS ARE DELETED AT LOGOFF
LOGOFF? (Y)/N/HOLD:y

COST IN U.S. DOLLARS	SINCE FILE ENTRY	TOTAL SESSION
FULL ESTIMATED COST	11.86	190.43

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)	SINCE FILE ENTRY	TOTAL SESSION
CA SUBSCRIBER PRICE	-1.60	-1.60

STN INTERNATIONAL LOGOFF AT 10:39:35 ON 08 SEP 2008

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LOGINID:SSPTAPEZ1617

PASSWORD:
TERMINAL (ENTER 1, 2, 3, OR ?):2

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NEWS 1 Web Page for STN Seminar Schedule - N. America
NEWS 2 APR 04 STN AnaVist, Version 1, to be discontinued
NEWS 3 APR 15 WPIDS, WPINDEX, and WPIX enhanced with new predefined hit display formats

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 NEWS  4  APR 28  EMBASE Controlled Term thesaurus enhanced
 NEWS  5  APR 28  IMSRESEARCH reloaded with enhancements
 NEWS  6  MAY 30  INPAFAMDB now available on STN for patent family
                  searching
 NEWS  7  MAY 30  DGENE, PCTGEN, and USGENE enhanced with new homology
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 NEWS  8  JUN 06  EPFULL enhanced with 260,000 English abstracts
 NEWS  9  JUN 06  KOREAPAT updated with 41,000 documents
 NEWS 10  JUN 13  USPATFULL and USPAT2 updated with 11-character
                  patent numbers for U.S. applications
 NEWS 11  JUN 19  CAS REGISTRY includes selected substances from
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 NEWS 12  JUN 25  CA/CAplus and USPAT databases updated with IPC
                  reclassification data
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 NEWS 14  JUN 30  EMBASE, EMBAL, and LEMBASE updated with additional
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 NEWS 22  AUG 13  CA/CAplus enhanced with printed Chemical Abstracts
                  page images from 1967-1998
 NEWS 23  AUG 15  CAOLD to be discontinued on December 31, 2008
 NEWS 24  AUG 15  CAplus currency for Korean patents enhanced
 NEWS 25  AUG 25  CA/CAplus, CASREACT, and IFI and USPAT databases
                  enhanced for more flexible patent number searching
 NEWS 26  AUG 27  CAS definition of basic patents expanded to ensure
                  comprehensive access to substance and sequence
                  information

 NEWS EXPRESS JUNE 27 08 CURRENT WINDOWS VERSION IS V8.3,
              AND CURRENT DISCOVER FILE IS DATED 23 JUNE 2008.

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* * * * * * * * * * * * * * * * STN  Columbus  * * * * * * * * * * * * * * * *

FILE 'HOME' ENTERED AT 10:51:02 ON 08 SEP 2008
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=> file reg
COST IN U.S. DOLLARS                                SINCE FILE      TOTAL
                                                         ENTRY    SESSION
FULL ESTIMATED COST                                       0.42       0.42

FILE 'REGISTRY' ENTERED AT 10:51:56 ON 08 SEP 2008
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STRUCTURE FILE UPDATES:    7 SEP 2008  HIGHEST RN 1047406-12-1
DICTIONARY FILE UPDATES:   7 SEP 2008  HIGHEST RN 1047406-12-1

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=>
Uploading C:\Program Files\STNEXP\Queries\10542351 take 2.str

L1      STRUCTURE UPLOADED

=> d l1
L1 HAS NO ANSWERS
L1              STR
/ Structure 6 in file .gra /


Structure attributes must be viewed using STN Express query preparation.


=> s l1
SAMPLE SEARCH INITIATED 10:52:13 FILE 'REGISTRY'
SAMPLE SCREEN SEARCH COMPLETED -       42 TO ITERATE

100.0% PROCESSED       42 ITERATIONS                              27 ANSWERS
SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS:  ONLINE  **COMPLETE**
                        BATCH   **COMPLETE**
PROJECTED ITERATIONS:          452 TO     1228
PROJECTED ANSWERS:             229 TO      851
```

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L2           27 SEA SSS SAM L1

=> s l1 sss ful
FULL SEARCH INITIATED 10:52:21 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED -      554 TO ITERATE

100.0% PROCESSED      554 ITERATIONS                              342 ANSWERS
SEARCH TIME: 00.00.01

L3          342 SEA SSS FUL L1

=> file cap
COST IN U.S. DOLLARS                                SINCE FILE      TOTAL
                                                         ENTRY    SESSION
FULL ESTIMATED COST                                     178.36     178.78

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FILE COVERS 1907 - 8 Sep 2008  VOL 149 ISS 11
FILE LAST UPDATED: 7 Sep 2008  (20080907/ED)

Caplus now includes complete International Patent Classification (IPC)
reclassification data for the second quarter of 2008.

Effective October 17, 2005, revised CAS Information Use Policies apply.
They are available for your review at:

http://www.cas.org/legal/infopolicy.html

=> s l3
L4           5 L3

=> d l4 1-5 ibib abs hitstr

L4   ANSWER 1 OF 5  CAPLUS  COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER:        2004:1016002  CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER:         142:6311
TITLE:                   A preparation of benzamide derivatives, useful as
                         glyoxalase inhibitors
INVENTOR(S):             Ashton, Mark; Davidson, Alan; Thomas, Russell;
                         Whittaker, Mark
PATENT ASSIGNEE(S):      Chroma Therapeutics Limited, UK
SOURCE:                  PCT Int. Appl., 77 pp.
```

CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.		DATE
WO 2004101506	A1	20041125	WO 2004-GB2101		20040514
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW					
RW: BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG					
AU 2004238625	A1	20041125	AU 2004-238625		20040514
CA 2525438	A1	20041125	CA 2004-2525438		20040514
EP 1622869	A1	20060208	EP 2004-733031		20040514
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, FI, RO, CY, TR, BG, CZ, EE, HU, PL, SK					
JP 2006528964	T	20061228	JP 2006-530505		20040514
US 20070015799	A1	20070118	US 2005-556901		20051115
PRIORITY APPLN. INFO.:			GB 2003-11195	A	20030515
			WO 2004-GB2101	W	20040514

OTHER SOURCE(S): MARPAT 142:6311
GI

/ Structure 7 in file .gra /

AB The invention relates to a prepn. of benzamide derivs. of formula I [wherein: X is N or CH; R1 is H, CN, halogen, NH2, or S-alkyl, etc.; R2 is H, CF3, (un)substituted aryl, cycloalkyl, or heterocyclyl, etc.; R3 is the same as R2 excluding CF3; R4 is H, (un)substituted aryl or heterocyclyl; R5 is H, (un)substituted alkyl, aryl, or alkylene-aryl; L1 is (un)substituted alkylene, arylene, or alkylene-arylene, etc.; L2 is a single bond, (un)substituted alkylene, or C(O)-alkylene, etc.; L3 and L4 are independently selected from a single bond, (un)substituted alkylene, or alkylene-NHN(OH)C(O)-arylene, etc.], useful as glyoxalase inhibitors. For instance, benzamide deriv. II (R6 = OH; 80% proliferation inhibition in HL60s, IC50 = 8.3 .mu.M) was prepd. via hydrolysis of N-(benzoyloxy)benzamide II [R6 = OC(O)Ph] with a yield of 41%.

IT ***354555-67-2P***
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of benzamide derivs. useful as glyoxalase inhibitors)

RN 354555-67-2 CAPLUS
CN Benzeneacetic acid, .alpha.-[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]- (CA INDEX NAME)

/ Structure 8 in file .gra /

REFERENCE COUNT: 11 THERE ARE 11 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 2 OF 5 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 2004:633527 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 141:174078
TITLE: Preparation of thienylpyridinecarbonitriles as bacterial enoyl-ACP reductase (FabI) inhibitors.
INVENTOR(S): Moir, Donald T.; Xiang, Yibin; Arvanites, Anthony C.; Ali, Syed Masarrat; Geng, Bolin; Ashwell, Mark A.; Orgueira, Hernan Antonio
PATENT ASSIGNEE(S): Genome Therapeutics Corporation, USA; Arqule
SOURCE: PCT Int. Appl., 54 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.		DATE
WO 2004064837	A1	20040805	WO 2004-US1327		20040116
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ					
US 20070027190	A1	20070201	US 2006-542351		20060807
PRIORITY APPLN. INFO.:			US 2003-441411P	P	20030117
			WO 2004-US1327	W	20040116

OTHER SOURCE(S): MARPAT 141:174078
GI

/ Structure 9 in file .gra /

AB Title compds. I [R1, R2 = (un)substituted monocyclic aryl, heteroaryl; Y = X1-X2; X1 = bond, (un)substituted alkylene; X2 = aryl, heteroaryl, cycloaliph., etc.] and their pharmaceutically acceptable salts were prepd. For example, condensation-annulation of 1,3-di-2-thienyl-2-propen-1-one and 2-cyanoethanethioamide, followed by 4-(bromomethyl)benzoic acid S-alkylation of the resulting thioxopyridinecarbonitrile (no data provided), afforded claimed thienylpyridinecarbonitrile II. In methicillin-resistant Staphylococcus aureus minimal inhibitory concn. (MIC) assays, 14-examples of compds. I exhibited MIC values ranging from 0.75->64 .mu.g/mL, e.g., the MIC value of thienylpyridinecarbonitrile II was 4 .mu.g/mL. Compds. I are claimed useful for the. Of note, compds. I are proposed to inhibit bacterial enoyl-ACP reductase (FabI), a NADH-dependent enoyl [acyl carrier protein] reductase enzyme in the fatty acid biosynthesis pathway.
IT ***296797-06-3P*** ***340808-61-9P*** ***354555-67-2P***
733052-04-5P ***733052-05-6P*** ***733052-06-7P***
733052-07-8P ***733052-09-0P***
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU

(Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of thienylpyridinecarbonitriles as bacterial enoyl-ACP reductase (FabI) inhibitors.)
RN 296797-06-3 CAPLUS
CN Acetamide, N-[3-(acetylamino)phenyl]-2-[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]- (CA INDEX NAME)

/ Structure 10 in file .gra /

RN 340808-61-9 CAPLUS
CN Benzoic acid, 4-[[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]methyl]- (CA INDEX NAME)

/ Structure 11 in file .gra /

RN 354555-67-2 CAPLUS
CN Benzeneacetic acid, .alpha.-[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]- (CA INDEX NAME)

/ Structure 12 in file .gra /

RN 733052-04-5 CAPLUS
CN Benzoic acid, 4-[2-[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]ethyl]- (CA INDEX NAME)

/ Structure 13 in file .gra /

RN 733052-05-6 CAPLUS
CN 3-Pyridinecarbonitrile, 2-[(1-phenylethyl)thio]-4,6-di-2-thienyl- (CA INDEX NAME)

/ Structure 14 in file .gra /

RN 733052-06-7 CAPLUS
CN Benzoic acid, 3-[[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]methyl]- (CA INDEX NAME)

/ Structure 15 in file .gra /

RN 733052-07-8 CAPLUS
CN Benzeneacetic acid, 4-[[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]methyl]- (CA INDEX NAME)

/ Structure 16 in file .gra /

RN 733052-09-0 CAPLUS
CN Propanoic acid, 3-[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]- (CA INDEX NAME)

/ Structure 17 in file .gra /

IT ***243987-05-5P***
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. of thienylpyridinecarbonitriles as bacterial enoyl-ACP reductase (FabI) inhibitors.)
RN 243987-05-5 CAPLUS
CN 3-Pyridinecarbonitrile, 1,2-dihydro-4,6-di-2-thienyl-2-thioxo- (CA INDEX NAME)

/ Structure 18 in file .gra /

REFERENCE COUNT: 3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 3 OF 5 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 2004:374624 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 141:239652
TITLE: Identification and characterization of inhibitors of bacterial enoyl-acyl carrier protein reductase
AUTHOR(S): Ling, Losee L.; Xian, Jun; Ali, Syed; Geng, Bolin; Fan, Jun; Mills, Debra M.; Arvanites, Anthony C.; Orgueira, Hernan; Ashwell, Mark A.; Carmel, Gilles; Xiang, Yibin; Moir, Donald T.
CORPORATE SOURCE: Genome Therapeutics Corporation, Waltham, MA, 02453, USA
SOURCE: Antimicrobial Agents and Chemotherapy (2004), 48(5), 1541-1547
CODEN: AMACCQ; ISSN: 0066-4804
PUBLISHER: American Society for Microbiology
DOCUMENT TYPE: Journal
LANGUAGE: English
AB Bacterial enoyl-acyl carrier protein reductase (ENR) catalyzes an essential step in fatty acid biosynthesis. ENR is an attractive target for narrow-spectrum antibacterial drug discovery because of its essential role in metab. and its sequence conservation across many bacterial species. In addn., the bacterial ENR sequence and structural organization are distinctly different from those of mammalian fatty acid biosynthesis enzymes. High-throughput screening to identify inhibitors of Escherichia coli ENR yielded four structurally distinct classes of hits. Several members of one of these, the 2-(alkylthio)-4,6-diphenylpyridine-3-carbonitriles ("thiopyridines"), inhibited both purified ENR (50% inhibitory concn. [IC50] = 3-25 .mu.M) and the growth of Staphylococcus aureus and Bacillus subtilis (MIC = 1-64 .mu.g/mL). The effect on cell growth is due in part to inhibition of fatty acid biosynthesis as judged by inhibition of incorporation of [14C]acetate into fatty acids and by the increased sensitivity of cells that underexpress an ENR-encoding gene (4-8-fold MIC shift). Synthesis of a variety of compds. in this chem. series revealed a correlation between IC50 and MIC, and the results provided initial structure-activity relationships. Preliminary structure-activity relationships, potency on purified ENR, and activity on bacterial cells indicate that members of the thiopyridine chem. series are effective fatty acid biosynthesis inhibitors suitable for further antibacterial development.

IT ***296797-06-3*** , GTC 268733 ***340808-61-9*** , GTC 004061
354555-67-2 , GTC 268963 ***733052-04-5*** , GTC 343129
733052-06-7 , GTC 343130 ***733052-07-8*** , GTC 330346
750595-50-7 , GTC 343131
RL: BSU (Biological study, unclassified); BIOL (Biological study)
(inhibitors of bacterial enoyl-acyl carrier protein reductase)
RN 296797-06-3 CAPLUS
CN Acetamide, N-[3-(acetylamino)phenyl]-2-[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]- (CA INDEX NAME)

/ Structure 19 in file .gra /

RN 340808-61-9 CAPLUS
CN Benzoic acid, 4-[[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]methyl]- (CA INDEX NAME)

/ Structure 20 in file .gra /

RN 354555-67-2 CAPLUS
CN Benzeneacetic acid, .alpha.-[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]- (CA INDEX NAME)

/ Structure 21 in file .gra /

RN 733052-04-5 CAPLUS
CN Benzoic acid, 4-[2-[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]ethyl]- (CA INDEX NAME)

/ Structure 22 in file .gra /

RN 733052-06-7 CAPLUS
CN Benzoic acid, 3-[[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]methyl]- (CA INDEX NAME)

/ Structure 23 in file .gra /

RN 733052-07-8 CAPLUS
CN Benzeneacetic acid, 4-[[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]methyl]- (CA INDEX NAME)

/ Structure 24 in file .gra /

RN 750595-50-7 CAPLUS
CN Benzoic acid, 4-[1-[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]ethyl]- (CA INDEX NAME)

/ Structure 25 in file .gra /

REFERENCE COUNT: 26 THERE ARE 26 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 4 OF 5 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 2000:412595 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 133:207831
TITLE: Synthesis of substituted 4-hydroxy-1H-thieno[2,3-b;4,5-b']dipyridin-2-ones
AUTHOR(S): Rodinovskaya, L. A.; Shestopalov, A. M.
CORPORATE SOURCE: N. D. Zelinsky Institute of Organic Chemistry, Russian Academy of Sciences, Moscow, 117913, Russia
SOURCE: Russian Chemical Bulletin (Translation of Izvestiya Akademii Nauk, Seriya Khimicheskaya) (2000), 49(2), 348-354
CODEN: RCBUEY; ISSN: 1066-5285
PUBLISHER: Consultants Bureau
DOCUMENT TYPE: Journal
LANGUAGE: English
GI

/ Structure 26 in file .gra /

AB Substituted 4-hydroxy-1H-thieno[2,3-b;4,5-b']dipyridin-2-ones, e.g., I, were prepd. by reaction of 3-cyanopyridine-2(1H)-thiones with alkyl 4-chloroacetoacetates and by intramol. cyclization of alkyl 4-(2-pyridylthio)acetoacetates or alkyl 3-(3-aminothieno[2,3-b]pyridin-2-yl)-3-oxopropionates under the action of bases.
IT ***243987-05-5***
RL: RCT (Reactant); RACT (Reactant or reagent)
(prepn. of 4-hydroxy-1H-thieno[2,3-b;4,5-b']dipyridin-2-ones)
RN 243987-05-5 CAPLUS
CN 3-Pyridinecarbonitrile, 1,2-dihydro-4,6-di-2-thienyl-2-thioxo- (CA INDEX NAME)

/ Structure 27 in file .gra /

IT ***290299-69-3P***
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. of 4-hydroxy-1H-thieno[2,3-b;4,5-b']dipyridin-2-ones)
RN 290299-69-3 CAPLUS
CN Butanoic acid, 4-[(3-cyano-4,6-di-2-thienyl-2-pyridinyl)thio]-3-oxo-, ethyl ester (CA INDEX NAME)

/ Structure 28 in file .gra /

REFERENCE COUNT: 9 THERE ARE 9 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 5 OF 5 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 1999:455705 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 131:228634
TITLE: One stage synthesis of 4,6-diaryl-3-cyanopyridine-2(1H)-thiones
AUTHOR(S): Shestopalov, A. M.; Nikishin, K. G.

CORPORATE SOURCE: N. D. Zelinskii Institute of Organic Chemistry, Russian Academy of Sciences, Moscow, 117913, Russia
SOURCE: Chemistry of Heterocyclic Compounds (New York)(Translation of Khimiya Geterotsiklicheskikh Soedinenii) (1999), Volume Date 1998, 34(9), 1093
CODEN: CHCCAL; ISSN: 0009-3122
PUBLISHER: Consultants Bureau
DOCUMENT TYPE: Journal
LANGUAGE: English

AB The title compds. were prepd. in 82-92% yields by cyclization of .alpha.,.beta.-unsatd. ketones with malononitrile and S in refluxing EtOH in the presence of morpholine.

IT ***243987-05-5P***
RL: SPN (Synthetic preparation); PREP (Preparation)
(synthesis of diarylcyanopyridine 2(1H)-thiones)

RN 243987-05-5 CAPLUS

CN 3-Pyridinecarbonitrile, 1,2-dihydro-4,6-di-2-thienyl-2-thioxo- (CA INDEX NAME)

/ Structure 29 in file .gra /

REFERENCE COUNT: 2 THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

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NEWS 5	APR 28	IMSRESEARCH reloaded with enhancements
NEWS 6	MAY 30	INPAFAMDB now available on STN for patent family searching
NEWS 7	MAY 30	DGENE, PCTGEN, and USGENE enhanced with new homology sequence search option
NEWS 8	JUN 06	EPFULL enhanced with 260,000 English abstracts
NEWS 9	JUN 06	KOREAPAT updated with 41,000 documents
NEWS 10	JUN 13	USPATFULL and USPAT2 updated with 11-character patent numbers for U.S. applications
NEWS 11	JUN 19	CAS REGISTRY includes selected substances from web-based collections
NEWS 12	JUN 25	CA/CAplus and USPAT databases updated with IPC reclassification data
NEWS 13	JUN 30	AEROSPACE enhanced with more than 1 million U.S. patent records
NEWS 14	JUN 30	EMBASE, EMBAL, and LEMBASE updated with additional options to display authors and affiliated organizations
NEWS 15	JUN 30	STN on the Web enhanced with new STN AnaVist Assistant and BLAST plug-in
NEWS 16	JUN 30	STN AnaVist enhanced with database content from EPFULL
NEWS 17	JUL 28	CA/CAplus patent coverage enhanced
NEWS 18	JUL 28	EPFULL enhanced with additional legal status information from the epoline Register
NEWS 19	JUL 28	IFICDB, IFIPAT, and IFIUDB reloaded with enhancements
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NEWS 22	AUG 13	CA/CAplus enhanced with printed Chemical Abstracts page images from 1967-1998
NEWS 23	AUG 15	CAOLD to be discontinued on December 31, 2008
NEWS 24	AUG 15	CAplus currency for Korean patents enhanced
NEWS 25	AUG 25	CA/CAplus, CASREACT, and IFI and USPAT databases enhanced for more flexible patent number searching
NEWS 26	AUG 27	CAS definition of basic patents expanded to ensure comprehensive access to substance and sequence information

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L1      STRUCTURE UPLOADED

=> d l1
L1 HAS NO ANSWERS
L1              STR
/ Structure 30 in file .gra /


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L2      STRUCTURE UPLOADED

=> d l2
L2 HAS NO ANSWERS
L2              STR

/ Structure 31 in file .gra /


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=> s l1 or l2
SAMPLE SEARCH INITIATED 11:32:19 FILE 'REGISTRY'
SAMPLE SCREEN SEARCH COMPLETED -      646 TO ITERATE

100.0% PROCESSED      646 ITERATIONS                              11 ANSWERS
SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS:  ONLINE  **COMPLETE**
                        BATCH   **COMPLETE**
PROJECTED ITERATIONS:        11396 TO    14444
PROJECTED ANSWERS:              22 TO      418

L3           11 SEA SSS SAM L1 OR L2

=> s l1 sss full
FULL SEARCH INITIATED 11:32:28 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED -    18549 TO ITERATE

100.0% PROCESSED    18549 ITERATIONS                            285 ANSWERS
SEARCH TIME: 00.00.01

L4          285 SEA SSS FUL L1
```

```
=> s l2 sss ful
FULL SEARCH INITIATED 11:32:33 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED -      742 TO ITERATE

100.0% PROCESSED      742 ITERATIONS                                 2 ANSWERS
SEARCH TIME: 00.00.01

L5            2 SEA SSS FUL L2

=> file cap
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                                                       ENTRY    SESSION
FULL ESTIMATED COST                                   356.72     356.93

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=> s l4 or l5
           100 L4
             3 L5
L6         102 L4 OR L5

=> s l6 and bacteria
        348391 BACTERIA
           129 BACTERIAS
        348461 BACTERIA
                 (BACTERIA OR BACTERIAS)
L7           3 L6 AND BACTERIA

=> d 1-3 l7 ibib abs hitstr

L7   ANSWER 1 OF 3  CAPLUS  COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER:        2007:196524  CAPLUS <<LOGINID::20080908>>
```

DOCUMENT NUMBER: 147:419384
TITLE: New antimicrobial 9-(p-heterocyclo-substituted anilino)-tetrahydroacridines
AUTHOR(S): Ebeid, M. Y.; Kamel, M. M.; Nofal, Z. M.; Ragab, F.; Zaghary, W. A.; El-Kady, M.
CORPORATE SOURCE: Faculty of Pharmacy, Cairo University, Egypt
SOURCE: Egyptian Journal of Chemistry (2006), 49(2), 277-285
CODEN: EGJCA3; ISSN: 0449-2285
PUBLISHER: National Information and Documentation Centre
DOCUMENT TYPE: Journal
LANGUAGE: English

AB A new series of 9-[p-(4-aryl-3-cyano-2-iminopyridin-6-yl)anilino]-1,2,3,4-tetrahydroacridines and their 2-oxo-(or thioxo)-pyridinylanilino derivs. were synthesized and evaluated against ***bacteria*** and fungi. These compds. showed high significant activity against Saccharomyces cerevisiae, Bacillus subtilis, Staphylococcus aureus, Penicillium notatum, Aspergillus niger, Candida utilis, and Candida albicans.

IT ***951320-46-0P***
RL: PAC (Pharmacological activity); PRP (Properties); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)
(new antimicrobial 9-(p-heterocyclo-substituted anilino)-tetrahydroacridines)
RN 951320-46-0 CAPLUS
CN 3-Pyridinecarbonitrile, 1,2-dihydro-4-phenyl-6-[4-[(1,2,3,4-tetrahydro-9-acridinyl)amino]phenyl]-2-thioxo- (CA INDEX NAME)

/ Structure 32 in file .gra /

IT ***951320-47-1P*** ***951320-48-2P*** ***951320-49-3P***
RL: PRP (Properties); SPN (Synthetic preparation); PREP (Preparation)
(new antimicrobial 9-(p-heterocyclo-substituted anilino)-tetrahydroacridines)
RN 951320-47-1 CAPLUS
CN 3-Pyridinecarbonitrile, 1,2-dihydro-4-(3-methoxyphenyl)-6-[4-[(1,2,3,4-tetrahydro-9-acridinyl)amino]phenyl]-2-thioxo- (CA INDEX NAME)

/ Structure 33 in file .gra /

RN 951320-48-2 CAPLUS
CN 3-Pyridinecarbonitrile, 4-(3-chlorophenyl)-1,2-dihydro-6-[4-[(1,2,3,4-tetrahydro-9-acridinyl)amino]phenyl]-2-thioxo- (CA INDEX NAME)

/ Structure 34 in file .gra /

RN 951320-49-3 CAPLUS
CN 3-Pyridinecarbonitrile, 1,2-dihydro-6-[4-[(1,2,3,4-tetrahydro-9-acridinyl)amino]phenyl]-2-thioxo-4-(2,3,4-trimethoxyphenyl)- (CA INDEX NAME)

/ Structure 35 in file .gra /

IT ***951320-50-6***

RL: RCT (Reactant); RACT (Reactant or reagent)
(new antimicrobial 9-(p-heterocyclo-substituted anilino)-tetrahydroacridines)
RN 951320-50-6 CAPLUS
CN 3-Pyridinecarbonitrile, 4-[3-(dimethylamino)phenyl]-1,2-dihydro-6-[4-[(1,2,3,4-tetrahydro-9-acridinyl)amino]phenyl]-2-thioxo- (CA INDEX NAME)

/ Structure 36 in file .gra /

REFERENCE COUNT: 20 THERE ARE 20 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 2 OF 3 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 1999:221628 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 130:325083
TITLE: Synthesis and antimicrobial activity of some new 4-methylquinolines
AUTHOR(S): Kamel, M. M.; Fathala, O. A.; Abdou, W. A. M.; Haiba, M. E.
CORPORATE SOURCE: Medicinal Chemistry Department, National Research Centre, Cairo, Egypt
SOURCE: Proceedings of the Pakistan Academy of Sciences (1997), 34(1), 7-11
CODEN: PKSPAW; ISSN: 0377-2969
PUBLISHER: Pakistan Academy of Sciences
DOCUMENT TYPE: Journal
LANGUAGE: English
AB Some new 4,8-dimethyl-2-[p-(3-cyano-2-thioxo-4-arylpyridine-6-yl)]anilinoquinolines and 7-chloro-4-methyl-2-(4-hydroxy)anilinoquinoline Mannich bases were synthesized for the purpose of antimicrobial evaluation against ***bacteria*** , yeast, and fungi. Two compds. showed activity against these microorganisms.
IT ***218272-67-4P*** ***218272-68-5P*** ***218272-69-6P*** ***223697-02-7P***
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of methylquinolines as antibacterial and antifungal agents)
RN 218272-67-4 CAPLUS
CN 3-Pyridinecarbonitrile, 6-[4-[(4,8-dimethyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-4-(4-methoxyphenyl)-2-thioxo- (CA INDEX NAME)

/ Structure 37 in file .gra /

RN 218272-68-5 CAPLUS
CN 3-Pyridinecarbonitrile, 4-[4-(dimethylamino)phenyl]-6-[4-[(4,8-dimethyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-2-thioxo- (CA INDEX NAME)

/ Structure 38 in file .gra /

RN 218272-69-6 CAPLUS
CN 3-Pyridinecarbonitrile, 6-[4-[(4,8-dimethyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-4-(3-methoxy-2-nitrophenyl)-2-thioxo- (CA INDEX NAME)

/ Structure 39 in file .gra /

RN 223697-02-7 CAPLUS
CN 3-Pyridinecarbonitrile, 6-[4-[(7-chloro-4-methyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-4-(4-methoxyphenyl)-2-thioxo- (CA INDEX NAME)

/ Structure 40 in file .gra /

REFERENCE COUNT: 17 THERE ARE 17 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 3 OF 3 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 1998:702455 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 130:66375
TITLE: Synthesis of some new 4-methylquinolines of possible biological activity
AUTHOR(S): Kamel, M. M.; Fathalla, O. A.; Abdou, W. A. M.; Omer, M. T.; Haiba, M. E.
CORPORATE SOURCE: Medicinal Chemistry Department, National Research Centre, Cairo, Egypt
SOURCE: Egyptian Journal of Pharmaceutical Sciences (1998), Volume Date 1997, 38(1-3), 79-86
CODEN: EJPSBZ; ISSN: 0301-5068
PUBLISHER: National Information and Documentation Centre
DOCUMENT TYPE: Journal
LANGUAGE: English
AB Some new 4,8-dimethyl-2-[p-(3-cyano-2-thioxo-4-arylpyridin-6-yl)]anilinoquinolines and 7-chloro-4-methyl-2-(4-hydroxy)anilinoquinolines Mannich bases were synthesized for the purpose of antimicrobial evaluation against ***bacteria*** , yeast, and fungi. 7-Chloro-4-methyl-2-[4-hydroxy-3,5-di(diethylaminomethyl)]anilinoquinoline showed fungicidal activity against Aspergillus niger.
IT ***218272-67-4P*** ***218272-68-5P*** ***218272-69-6P***
RL: SPN (Synthetic preparation); PREP (Preparation)
(synthesis and antimicrobial activity of 4-methylquinolines)
RN 218272-67-4 CAPLUS
CN 3-Pyridinecarbonitrile, 6-[4-[(4,8-dimethyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-4-(4-methoxyphenyl)-2-thioxo- (CA INDEX NAME)

/ Structure 41 in file .gra /

RN 218272-68-5 CAPLUS
CN 3-Pyridinecarbonitrile, 4-[4-(dimethylamino)phenyl]-6-[4-[(4,8-dimethyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-2-thioxo- (CA INDEX NAME)

/ Structure 42 in file .gra /

RN 218272-69-6 CAPLUS
CN 3-Pyridinecarbonitrile, 6-[4-[(4,8-dimethyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-4-(3-methoxy-2-nitrophenyl)-2-thioxo- (CA INDEX NAME)

/ Structure 43 in file .gra /

REFERENCE COUNT: 15 THERE ARE 15 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

=> file stng

COST IN U.S. DOLLARS	SINCE FILE ENTRY	TOTAL SESSION
FULL ESTIMATED COST	21.83	378.76

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)	SINCE FILE ENTRY	TOTAL SESSION
CA SUBSCRIBER PRICE	-2.40	-2.40

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=> file stng

COST IN U.S. DOLLARS	SINCE FILE ENTRY	TOTAL SESSION
FULL ESTIMATED COST	0.66	379.42

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)	SINCE FILE ENTRY	TOTAL SESSION
CA SUBSCRIBER PRICE	0.00	-2.40

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=> file reg

COST IN U.S. DOLLARS	SINCE FILE ENTRY	TOTAL SESSION
FULL ESTIMATED COST	0.54	379.96

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)	SINCE FILE ENTRY	TOTAL SESSION
CA SUBSCRIBER PRICE	0.00	-2.40

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STRUCTURE FILE UPDATES: 7 SEP 2008 HIGHEST RN 1047406-12-1
DICTIONARY FILE UPDATES: 7 SEP 2008 HIGHEST RN 1047406-12-1

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=>
Uploading C:\Program Files\STNEXP\Queries\10542351 take 5.str

L8   STRUCTURE UPLOADED

=> d l8
L8 HAS NO ANSWERS
L8   STR

/ Structure 44 in file .gra /

Structure attributes must be viewed using STN Express query preparation.

=> s l8 sss ful
FULL SEARCH INITIATED 11:49:05 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED -   1468 TO ITERATE

100.0% PROCESSED   1468 ITERATIONS   16 ANSWERS
SEARCH TIME: 00.00.01

L9   16 SEA SSS FUL L8

=> file cap
COST IN U.S. DOLLARS   SINCE FILE   TOTAL
                                                         ENTRY   SESSION
FULL ESTIMATED COST   178.36   558.32

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)   SINCE FILE   TOTAL
                                                         ENTRY   SESSION
CA SUBSCRIBER PRICE   0.00   -2.40

FILE 'CAPLUS' ENTERED AT 11:49:09 ON 08 SEP 2008
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FILE COVERS 1907 - 8 Sep 2008 VOL 149 ISS 11
FILE LAST UPDATED: 7 Sep 2008 (20080907/ED)

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=> s l9
L10   5 L9

=> d l10 1-5 ibib abs hitstf
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The following are valid formats:

ABS --------- GI and AB
ALL --------- BIB, AB, IND, RE
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CAN --------- List of CA abstract numbers without answer numbers
CBIB -------- AN, plus Compressed Bibliographic Data
CLASS ------- IPC, NCL, ECLA, FTERM
DALL -------- ALL, delimited (end of each field identified)
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FBIB -------- AN, BIB, plus Patent FAM
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STD --------- BIB, CLASS

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its structure diagram
HITSEQ ------ HIT RN, its text modification, its CA index name, its
structure diagram, plus NTE and SEQ fields
FHITSTR ----- First HIT RN, its text modification, its CA index name, and
its structure diagram
FHITSEQ ----- First HIT RN, its text modification, its CA index name, its
structure diagram, plus NTE and SEQ fields
KWIC -------- Hit term plus 20 words on either side
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ENTER DISPLAY FORMAT (BIB):end

=> d l10 1-5 ibib abs hitstr

L10 ANSWER 1 OF 5 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 2007:798258 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 148:538031
TITLE: Synthesis and investigation of the stability of esters of 6'-carbamoylmethylthio-5'-cyano-1',4'-dihydro-3,4'- and -4,4'-bipyridine-3'-carboxylic acids. Part 1. Esters of 6'-carbamoylmethylthio-5'-cyano-1',4'-dihydro-3,4'-bipyridine-3'-carboxylic acids
AUTHOR(S): Kazoka, H.; Krauze, A.; Vilums, M.; Cernova, L.; Sile, L.; Duburs, G.
CORPORATE SOURCE: Latvian Institute of Organic Synthesis, Riga, LV-1006, Latvia
SOURCE: Chemistry of Heterocyclic Compounds (New York, NY, United States) (2007), 43(1), 50-57
CODEN: CHCCAL; ISSN: 0009-3122
PUBLISHER: Springer
DOCUMENT TYPE: Journal
LANGUAGE: English
AB Esters of 6'-carbamoylmethylthio-5'-cyano-1',4'-dihydro-3,4'-bipyridine-3'-carboxylic acids are obtained by the alkylation of piperidinium 3'-alkoxycarbonyl-5'-cyano-1',4'-dihydro-3,4'-bipyridine-6'-thiolates with iodoacetamide. For an HPLC study of the stability of solns. of the abovementioned 1,4-dihydrobipyridines (soln., pH 2.3-9.0), the appropriate esters of 6'-carbamoylmethylthio-5'-cyano-3,4'-bipyridine-3'-carboxylic acids and esters of 8-cyano-5-methyl(or phenyl)-3-oxo-7-pyridin-3-yl-2,3-dihydro-7H-thiazolo[3,2-a]pyridine-6-carboxylic acids were synthesized as

ref. compds. Anal. by HPLC was carried out under conditions of reverse-phase chromatog. It was shown that solns. of the investigated compds. in a mixt. of MeCN and phosphate buffer (pH 3.0-5.0) were stable for 1 mo on storage protected from light. Under the action of light in all the solns. investigated irresp. of pH, the formation occurs of the corresponding esters of 6'-carbamoylmethylthio-5'-cyano-3,4'-bipyridine-3'-carboxylic acids. The presence of esters of 8-cyano-5-methyl(or phenyl)-3-oxo-7-pyridin-3-yl-2,3-dihydro-7H-thiazolo[3,2-a]pyridine-6-carboxylic acids (.ltoreq.4%) was detected only in 0.1% solns. of phosphoric acid (pH 2.3) under conditions of storage of the latter protected from light. A series of as yet unidentified products was detected in solns. of pH 7.0-9.0.

IT ***144969-93-7P***
RL: PRP (Properties); SPN (Synthetic preparation); PREP (Preparation)
(prepn. and stability of esters of (carbamoylmethylthio)cyanodihydrobipyridinecarboxylates)

RN 144969-93-7 CAPLUS

CN [3,4'-Bipyridine]-3'-carboxylic acid, 6'-[(2-amino-2-oxoethyl)thio]-5'-cyano-2'-phenyl-, ethyl ester (CA INDEX NAME)

/ Structure 45 in file .gra /

REFERENCE COUNT: 17 THERE ARE 17 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L10 ANSWER 2 OF 5 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1999:547305 CAPLUS <<LOGINID::20080908>>

DOCUMENT NUMBER: 131:295109

TITLE: Derivatives of 3-cyano-6-phenyl-4-(3'-pyridyl)-pyridine-2(1H)-thione and their neurotropic activity

AUTHOR(S): Krauze, Aivars; Germane, Skaidrite; Eberlins, Ojars; Sturms, Igors; Klusa, Vija; Duburs, Gunars

CORPORATE SOURCE: Latvian Institute of Organic Synthesis, Riga, LV-1006, Latvia

SOURCE: European Journal of Medicinal Chemistry (1999), 34(4), 301-310
CODEN: EJMCA5; ISSN: 0223-5234

PUBLISHER: Editions Scientifiques et Medicales Elsevier

DOCUMENT TYPE: Journal

LANGUAGE: English

AB 3-Cyano-6-phenyl-4-(3'-pyridyl)pyridine-2(1H)-thione, the related 2,2'-bis-pyridyldisulfide, 2-alkylthiopyridines and 2-amino-thieno[2,3-b]pyridines were synthesized and their neurotropic activities were examd. Bispyridyldisulfide exhibited low toxicity (LD50 > 5000 mg/kg, ICR mice, i.p.) and selective antiamnesic activity at the doses of 0.05-0.5 mg/kg p.o. This effect was significantly higher than that induced by Piracetam at 50 mg/kg.

IT ***247056-20-8P*** ***247056-23-1P*** ***247056-24-2P***
247056-25-3P ***247056-26-4P*** ***247056-27-5P***
247056-28-6P
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); PRP (Properties); RCT (Reactant); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); RACT (Reactant or reagent); USES (Uses)
(prepn. and neurotropic activity of 3-cyano-6-phenyl-4-(3'-pyridyl)-pyridine-2(1H)-thione derivs.)

RN 247056-20-8 CAPLUS
CN [3,4'-Bipyridine]-3'-carbonitrile, 1',2'-dihydro-6'-phenyl-2'-thioxo- (CA INDEX NAME)

/ Structure 46 in file .gra /

RN 247056-23-1 CAPLUS
CN [3,4'-Bipyridine]-3'-carbonitrile, 2'-(methylthio)-6'-phenyl- (CA INDEX NAME)

/ Structure 47 in file .gra /

RN 247056-24-2 CAPLUS
CN [3,4'-Bipyridine]-3'-carbonitrile, 2'-(ethylthio)-6'-phenyl- (CA INDEX NAME)

/ Structure 48 in file .gra /

RN 247056-25-3 CAPLUS
CN Acetic acid, 2-[(3'-cyano-6'-phenyl[3,4'-bipyridin]-2'-yl)thio]-, ethyl ester (CA INDEX NAME)

/ Structure 49 in file .gra /

RN 247056-26-4 CAPLUS
CN [3,4'-Bipyridine]-3'-carbonitrile, 2'-[(cyanomethyl)thio]-6'-phenyl- (CA INDEX NAME)

/ Structure 50 in file .gra /

RN 247056-27-5 CAPLUS
CN Acetamide, 2-[(3'-cyano-6'-phenyl[3,4'-bipyridin]-2'-yl)thio]- (CA INDEX NAME)

/ Structure 51 in file .gra /

RN 247056-28-6 CAPLUS
CN [3,4'-Bipyridine]-3'-carbonitrile, 2'-[(2-oxo-2-phenylethyl)thio]-6'-phenyl- (CA INDEX NAME)

/ Structure 52 in file .gra /

IT ***247056-21-9P***
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); PRP (Properties); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. and neurotropic activity of 3-cyano-6-phenyl-4-(3'-pyridyl)-pyridine-2(1H)-thione derivs.)
RN 247056-21-9 CAPLUS

CN [3,4'-Bipyridine]-3'-carbonitrile, 2',2'''-dithiobis[6'-phenyl- (9CI) (CA INDEX NAME)

/ Structure 53 in file .gra /

IT ***247056-22-0P***
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. and neurotropic activity of 3-cyano-6-phenyl-4-(3'-pyridyl)-pyridine-2(1H)-thione derivs.)
RN 247056-22-0 CAPLUS
CN [3,4'-Bipyridine]-3'-carbonitrile, 6'-phenyl-2'-(1-piperidinylthio)- (CA INDEX NAME)

/ Structure 54 in file .gra /

REFERENCE COUNT: 48 THERE ARE 48 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L10 ANSWER 3 OF 5 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 1993:38791 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 118:38791
ORIGINAL REFERENCE NO.: 118:7067a,7070a
TITLE: Synthesis, properties, and cardiotonic activity of 2-carbamoylmethylthio-6-phenyl-5-ethoxycarbonyl-3-cyclo-4-(pyrido-3'yl)pyridine derivatives and their hydrogenated analogs
AUTHOR(S): Krauze, A.; Garalene, V.; Duburs, G.
CORPORATE SOURCE: Inst. Org. Synth., Riga, Latvia
SOURCE: Khimiko-Farmatsevticheskii Zhurnal (1992), 26(5), 40-3
CODEN: KHFZAN; ISSN: 0023-1134
DOCUMENT TYPE: Journal
LANGUAGE: Russian
GI

/ Structure 55 in file .gra /

AB Cyclocondensation of PhCOCH2CO2Et with 2-cyano-3-pyridinethioacrylamide in the presence of bases gave pyridinecarboxylates I (X+ = piperidino, Na) which when treated with ICH2CONH2 gave 82% amide II; betaine III (R = H) similarly treated gave amide III (R = CH2CONH2) which underwent base-catalyzed cyclization to give thienopyridine IV (R1 = 3-pyridyl). Addnl. obtained was IV (R1 = Ph). The 4,3'-bipyridines show dual activity-neg. inotropic action at low concns. and pos. inotropic activity at concns. >10-5M.
IT ***144969-93-7P***
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn., cyclization, and cardiotonic properties of)
RN 144969-93-7 CAPLUS
CN [3,4'-Bipyridine]-3'-carboxylic acid, 6'-[(2-amino-2-oxoethyl)thio]-5'-cyano-2'-phenyl-, ethyl ester (CA INDEX NAME)

/ Structure 56 in file .gra /

L10 ANSWER 4 OF 5 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 1990:515227 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 113:115227
ORIGINAL REFERENCE NO.: 113:19527a,19530a
TITLE: Polycyclic pyridines. Part 8. Synthesis of new primary, secondary and tertiary 3-aminothieno[2,3-b]pyridine-2-carboxamides by different pathways
AUTHOR(S): Wagner, G.; Vieweg, H.; Leistner, S.; Boehm, N.; Krasselt, U.; Hanfeld, Vera; Prantz, J.; Grupe, Renate
CORPORATE SOURCE: Sekt. Biowiss., Karl-Marx-Univ., Leipzig, DDR-7010, Ger. Dem. Rep.
SOURCE: Pharmazie (1990), 45(2), 102-9
CODEN: PHARAT; ISSN: 0031-7144
DOCUMENT TYPE: Journal
LANGUAGE: German
OTHER SOURCE(S): CASREACT 113:115227
GI

/ Structure 57 in file .gra /

AB The treatment of 2-thioxo-1,2-dihydropyridine-3-carbonitriles with ClCH2CO2NR1R3 (R1, R2 = H, Me, Et) gave 3-aminothieno[2,3-b]pyridinecarboxylic acid amides I [R1 = H, Et, Me; R2 = H, Et, Bu, cyclohexyl, CH2CH2OH, CH2CO2H; R1R2 = (CH2)5; R3 = Me, Ph, 4-BrC6H4, 3-pyridyl, CONH2, etc; R4 = H, Me, CH2C6H4(CN)-4; R5 = Me, C6H4Cl-4, Ph, C6H4Br-4, furyl, naphthyl, OH). Some of the compds. thus prepd., e.g. I (R1 = R2 = R4 = H, R3 = Me, R5 = Ph) and I (R1 = R4 = H, R2 = CH2CH2OH, R3 = R5 = Me) showed activity as antiallergics in the passive cutaneous anaphylaxis test in rats.
IT ***127144-07-4***
RL: RCT (Reactant); RACT (Reactant or reagent)
(condensation reaction of, with chloroacetamide)
RN 127144-07-4 CAPLUS
CN [3,4'-Bipyridine]-3'-carbonitrile, 1',2'-dihydro-6'-(2-naphthalenyl)-2'-thioxo- (CA INDEX NAME)

/ Structure 58 in file .gra /

L10 ANSWER 5 OF 5 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 1990:216643 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 112:216643
ORIGINAL REFERENCE NO.: 112:36565a,36568a
TITLE: Multicyclic pyridines. Part 6. Synthesis of new heterocycle substituted 2-thioxo-1,2-dihydropyridine-3-carbonitriles
AUTHOR(S): Vieweg, H.; Hanfeld, Vera; Leistner, S.; Wagner, G.
CORPORATE SOURCE: Sekt. Biowiss., Karl-Marx-Univ., Leipzig, DDR-7010, Ger. Dem. Rep.
SOURCE: Pharmazie (1989), 44(9), 639-40
CODEN: PHARAT; ISSN: 0031-7144

DOCUMENT TYPE: Journal
LANGUAGE: German
OTHER SOURCE(S): CASREACT 112:216643
GI

/ Structure 59 in file .gra /

AB Condensation of R1COMe (R1 = 2-furyl, 2-thienyl, 2-naphthyl) with R2CHO (R2 = Ph, 4-FC6H4, 4-ClC6H4, 4-BrC6H4, 3-pyridyl) in MeOH or H2O contg. NaOH gave 45-88% R1COCH:CHR2 which on cyclocondensation with NH2CSCH2CN in the presence of NaOMe in MeOH gave 32-71% title compds. I. Cyclocondensation of 1-(2-thienyl)-1,3-butanedione with NH2CSCH2CN in the presence of K2CO3-Me2CO gave isomeric mixt. of I (R1 = 2-thienyl, R2 = Me; R1 = Me, R2 = 2-thienyl) which on condensation with ClCH2CO2Et followed by base-mediated cyclization gave thienopyridinecarboxylates II (R3 = 2-thienyl, R4 = Me; R3 = Me, R4 = 2-thienyl).
IT ***127144-07-4P***
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. of)
RN 127144-07-4 CAPLUS
CN [3,4'-Bipyridine]-3'-carbonitrile, 1',2'-dihydro-6'-(2-naphthalenyl)-2'-thioxo- (CA INDEX NAME)

/ Structure 60 in file .gra /

=> file reg

COST IN U.S. DOLLARS	SINCE FILE ENTRY	TOTAL SESSION
FULL ESTIMATED COST	30.13	588.45

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)	SINCE FILE ENTRY	TOTAL SESSION
CA SUBSCRIBER PRICE	-4.00	-6.40

FILE 'REGISTRY' ENTERED AT 11:52:49 ON 08 SEP 2008

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=>
Uploading C:\Program Files\STNEXP\Queries\10542351 take 6.str

L11   STRUCTURE UPLOADED

=> d l11
L11 HAS NO ANSWERS
L11   STR
/ Structure 61 in file .gra /

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=>
Uploading C:\Program Files\STNEXP\Queries\10542351 take 7.str

L12   STRUCTURE UPLOADED

=> d l12
L12 HAS NO ANSWERS
L12   STR

/ Structure 62 in file .gra /

Structure attributes must be viewed using STN Express query preparation.

=> s l11 sss sam
SAMPLE SEARCH INITIATED 11:54:10 FILE 'REGISTRY'
SAMPLE SCREEN SEARCH COMPLETED -   2127 TO ITERATE

 94.0% PROCESSED   2000 ITERATIONS   50 ANSWERS
INCOMPLETE SEARCH (SYSTEM LIMIT EXCEEDED)
SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS: ONLINE **COMPLETE**
                        BATCH   **COMPLETE**
PROJECTED ITERATIONS: 39774 TO   45306
PROJECTED ANSWERS: 38498 TO   43944

L13   50 SEA SSS SAM L11

=> s l11 sss ful
FULL SEARCH INITIATED 11:54:24 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED -   41604 TO ITERATE

100.0% PROCESSED   41604 ITERATIONS   40140 ANSWERS
SEARCH TIME: 00.00.01

```
L14       40140 SEA SSS FUL L11

=> s l12 sss ful
FULL SEARCH INITIATED 11:55:00 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED -    51043 TO ITERATE

100.0% PROCESSED    51043 ITERATIONS                          2250 ANSWERS
SEARCH TIME: 00.00.01

L15        2250 SEA SSS FUL L12

=> file cap
COST IN U.S. DOLLARS                          SINCE FILE      TOTAL
                                                   ENTRY    SESSION
FULL ESTIMATED COST                             357.64     946.09

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)    SINCE FILE      TOTAL
                                                   ENTRY    SESSION
CA SUBSCRIBER PRICE                               0.00      -6.40

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FILE COVERS 1907 - 8 Sep 2008  VOL 149 ISS 11
FILE LAST UPDATED: 7 Sep 2008  (20080907/ED)

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=> s l14 or l15
          1101 L14
           765 L15
L16       1125 L14 OR L15

=> d l16 and bacteria
'AND' IS NOT A VALID FORMAT FOR FILE 'CAPLUS'
'BACTERIA' IS NOT A VALID FORMAT FOR FILE 'CAPLUS'
```

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```
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CAN --------- List of CA abstract numbers without answer numbers
CBIB -------- AN, plus Compressed Bibliographic Data
CLASS ------- IPC, NCL, ECLA, FTERM
DALL -------- ALL, delimited (end of each field identified)
DMAX -------- MAX, delimited for post-processing
FAM --------- AN, PI and PRAI in table, plus Patent Family data
FBIB -------- AN, BIB, plus Patent FAM
IND --------- Indexing data
IPC --------- International Patent Classifications
MAX --------- ALL, plus Patent FAM, RE
PATS -------- PI, SO
SAM --------- CC, SX, TI, ST, IT
SCAN -------- CC, SX, TI, ST, IT (random display, no answer numbers;
              SCAN must be entered on the same line as the DISPLAY,
              e.g., D SCAN or DISPLAY SCAN)
STD --------- BIB, CLASS

IABS -------- ABS, indented with text labels
IALL -------- ALL, indented with text labels
IBIB -------- BIB, indented with text labels
IMAX -------- MAX, indented with text labels
ISTD -------- STD, indented with text labels

OBIB -------- AN, plus Bibliographic Data (original)
OIBIB ------- OBIB, indented with text labels

SBIB -------- BIB, no citations
SIBIB ------- IBIB, no citations

HIT --------- Fields containing hit terms
HITIND ------ IC, ICA, ICI, NCL, CC and index field (ST and IT)
              containing hit terms
HITRN ------- HIT RN and its text modification
HITSTR ------ HIT RN, its text modification, its CA index name, and
              its structure diagram
HITSEQ ------ HIT RN, its text modification, its CA index name, its
              structure diagram, plus NTE and SEQ fields
FHITSTR ----- First HIT RN, its text modification, its CA index name, and
              its structure diagram
FHITSEQ ----- First HIT RN, its text modification, its CA index name, its
              structure diagram, plus NTE and SEQ fields
KWIC -------- Hit term plus 20 words on either side
OCC --------- Number of occurrence of hit term and field in which it occurs
```

To display a particular field or fields, enter the display field codes. For a list of the display field codes, enter HELP DFIELDS at an arrow prompt (=>). Examples of formats include: TI; TI,AU; BIB,ST; TI,IND; TI,SO. You may specify the format fields in any order and the information will be displayed in the same order as the format specification.

```
All of the formats (except for SAM, SCAN, HIT, HITIND, HITRN, HITSTR,
FHITSTR, HITSEQ, FHITSEQ, KWIC, and OCC) may be used with DISPLAY ACC
to view a specified Accession Number.
ENTER DISPLAY FORMAT (BIB):end

=> s l16 and bacteria
        348391 BACTERIA
           129 BACTERIAS
        348461 BACTERIA
                  (BACTERIA OR BACTERIAS)
L17          11 L16 AND BACTERIA

=> d scan

L17   11 ANSWERS   CAPLUS  COPYRIGHT 2008 ACS on STN
IC   ICM  C07D519-00
ICA  A61K031-545
ICI  C07D519-00, C07D501-00, C07D495-00
CC   26-5 (Biomolecules and Their Synthetic Analogs)
     Section cross-reference(s): 1
TI   Preparation of cephalosporin derivatives as antibacterial agents
ST   thienopyridiniomethylcephemcarboxylate prepn antibacterial; cephalosporin
     prepn antibacterial; cephemcarboxylate thienopyridiniomethyl prepn
     antibacterial
IT   Antibiotics
        ([thiazolyl(hydroxyimino)acetamido](thienopyridiniomethyl)cephemcarboxy
        late derivs.)
IT   152938-71-1P   152938-72-2P   152938-73-3P   152938-74-4P   152938-75-5P
     152938-76-6P   152938-77-7P   152938-78-8P   152938-79-9P   152938-80-2P
     152938-81-3P   152938-82-4P   152938-83-5P   152938-84-6P   152938-85-7P
     152938-86-8P   152938-87-9P   152938-88-0P   152938-89-1P   152938-90-4P
     152938-91-5P   152938-92-6P   152938-93-7P   152938-94-8P   152938-95-9P
     152938-96-0P   152938-97-1P   152938-98-2P   152938-99-3P   152939-00-9P
     152939-01-0P
     RL: BAC (Biological activity or effector, except adverse); BSU (Biological
     study, unclassified); SPN (Synthetic preparation); BIOL (Biological
     study); PREP (Preparation)
        (prepn. of, as antibacterial agent)
IT   151027-96-2P   151027-97-3P   152938-44-8P   152938-45-9P   152938-46-0P
     152938-47-1P   152938-48-2P   152938-49-3P   152938-50-6P   152938-51-7P
     152938-52-8P   152938-53-9P   152938-54-0P   152938-55-1P   152938-56-2P
     152938-57-3P   152938-58-4P   152938-59-5P   152938-60-8P   152938-61-9P
     152938-62-0P   152938-63-1P   152938-64-2P   152938-65-3P   152938-66-4P
     152938-67-5P   152938-68-6P   152938-69-7P   152938-70-0P   152939-02-1P
     152939-03-2P   152939-04-3P   152939-05-4P   152939-06-5P   152939-07-6P
     152939-08-7P   152939-09-8P   152939-10-1P   ***152939-11-2P***
       ***152939-12-3P***     152939-13-4P   152939-14-5P, Thieno[2,3-
b]pyridine-
     3,5-diamine   152939-15-6P   152939-16-7P   152939-17-8P   152939-18-9P
     152939-19-0P   152939-20-3P   152939-21-4P   152939-22-5P   152939-23-6P
     152939-24-7P   152939-25-8P   152939-26-9P   152939-27-0P   152939-28-1P
     152939-29-2P   152939-30-5P   152939-32-7P
     RL: SPN (Synthetic preparation); PREP (Preparation)
        (prepn. of, as intermediate for antibacterial cephalosporin deriv.)
IT   75-52-5, Nitromethane, reactions   105-36-2, Ethyl bromoacetate
     407-25-0, Trifluoroacetic anhydride   563-41-7, Semicarbazide
     hydrochloride   762-49-2, 1-Bromo-2-fluoroethane   883-40-9,
```

Diphenyldiazomethane 2365-48-2, Methyl thioglycolate 7664-41-7, Ammonia, reactions 18600-39-0, Cyclopropylamine hydrochloride 24424-99-5, Di-tert-butyl dicarbonate 26579-54-4, Thieno[2,3-b]pyridin-3-amine 31309-08-7 53174-99-5, 3-Formylthieno[2,3-b]pyridine 84728-65-4 142604-12-4 152939-31-6, Thieno[2,3-b]pyridin-3-ol 152939-33-8
RL: RCT (Reactant); RACT (Reactant or reagent)
(reaction of, in prepn. of antibacterial cephalosporin deriv.)

IT 11111-12-9D, Cephalosporin, derivs.
RL: RCT (Reactant); RACT (Reactant or reagent)
(thienopyridiniomethyl-)

HOW MANY MORE ANSWERS DO YOU WISH TO SCAN? (1):0

=> d l17 1-11 ibib abs hitstr

L17 ANSWER 1 OF 11 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 2008:526897 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 149:121710
TITLE: Virtual screening and experimental verification to identify potential inhibitors of the ErmC methyltransferase responsible for bacterial resistance against macrolide antibiotics
AUTHOR(S): Feder, Marcin; Purta, Elzbieta; Koscinski, Lukasz; Cubrilo, Sonja; Vlahovicek, Gordana Maravic; Bujnicki, Janusz M.
CORPORATE SOURCE: Laboratory of Bioinformatics and Protein Engineering, International Institute of Molecular and Cell Biology, Warsaw, 02109, Pol.
SOURCE: ChemMedChem (2008), 3(2), 316-322
CODEN: CHEMGX; ISSN: 1860-7179
PUBLISHER: Wiley-VCH Verlag GmbH & Co. KGaA
DOCUMENT TYPE: Journal
LANGUAGE: English
AB Methyltransferases from the Erm family catalyze S-adenosyl-L-methionine-dependent modification of a specific adenine residue in bacterial 23S rRNA, thereby conferring resistance to clin. important macrolide, lincosamide, and streptogramin B antibiotics. Thus, far, no inhibitors of these enzymes have been identified or designed that would effectively abolish the resistance in vivo. We used the crystal structure of ErmC' methyltransferase as a target for structure-based virtual screening of a database composed of 58679 lead-like compds. Among 77 compds. selected for exptl. validation (63 predicted to bind to the catalytic pocket and 14 compds. predicted to bind to the putative RNA binding site), we found several novel inhibitors that decrease the minimal inhibitory concn. of a macrolide antibiotic erythromycin toward an Escherichia coli strain that constitutively expresses ErmC'. Eight of them have IC50 values in the micromolar range. Anal. of docking models of the identified inhibitors suggests a novel strategy to develop potent and clin. useful inhibitors.
IT ***285987-27-1***
RL: BSU (Biological study, unclassified); PRP (Properties); BIOL (Biological study)
(ErmC' methyltransferase inhibitor; virtual screening and exptl. verification to identify potential inhibitors of ErmC methyltransferase responsible for bacterial resistance against macrolide antibiotics)
RN 285987-27-1 CAPLUS
CN 3-Pyridinecarbonitrile, 4-methyl-2,6-bis[(4-methylphenyl)thio]- (CA INDEX

NAME)

/ Structure 63 in file .gra /

REFERENCE COUNT: 26 THERE ARE 26 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L17 ANSWER 2 OF 11 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 2007:436667 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 147:469291
TITLE: A convenient synthesis of some new indeno[1,2-b]pyridines and indeno[1,2-b]thieno[3,2-e]pyridine derivatives with potential biological activity
AUTHOR(S): El-Ossaily, Yasser A.
CORPORATE SOURCE: Chemistry Department, Assiut University, Assiut, Egypt
SOURCE: Phosphorus, Sulfur and Silicon and the Related Elements (2007), 182(5), 1109-1117
CODEN: PSSLEC; ISSN: 1042-6507
PUBLISHER: Taylor & Francis, Inc.
DOCUMENT TYPE: Journal
LANGUAGE: English
OTHER SOURCE(S): CASREACT 147:469291
GI

/ Structure 64 in file .gra /

AB Heterocyclization of 1,3-indandione with arylidene cyanoacetamide, or arylideneindanone with cyanoacetamide afforded indenopyridinethione, which underwent cyclization with Et chloroacetate or chloroacetone to give indenothienopyridines. The alkylthioindenopyridines. underwent ring closure with sodium ethoxide to produce aminoindenothienopyridines, e.g., I. The indenothienopyridinecarbonitriles underwent heterocyclization with carbon disulfide in pyridine to give indenopyridinothienopyrimidines, e.g., II. Most of the synthesized compds. were screened in vitro for their antimicrobial activities against four species of ***bacteria*** and six species of fungi using chloramphenicol and terbinafine as stds.

IT ***311767-75-6P*** ***952720-95-5P*** ***952720-97-7P*** ***952720-98-8P*** ***952720-99-9P***
RL: PAC (Pharmacological activity); RCT (Reactant); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); RACT (Reactant or reagent)
(prepn., antibacterial and antifungal activity of indenopyridines, indenothienopyridines, and indenopyridinothienopyrimidines starting from indandione or (arylidene)indandiones using heterocyclization as key step)

RN 311767-75-6 CAPLUS
CN 1H-Indeno[1,2-b]pyridine-3-carbonitrile, 2,5-dihydro-5-oxo-4-(2-thienyl)-2-thioxo- (CA INDEX NAME)

/ Structure 65 in file .gra /

RN 952720-95-5 CAPLUS
CN 5H-Indeno[1,2-b]pyridine-3-carbonitrile, 2-[(cyanomethyl)thio]-5-oxo-4-(2-thienyl)- (CA INDEX NAME)

/ Structure 66 in file .gra /

RN 952720-97-7 CAPLUS
CN 5H-Indeno[1,2-b]pyridine-3-carbonitrile, 5-oxo-2-[(2-oxo-2-phenylethyl)thio]-4-(2-thienyl)- (CA INDEX NAME)

/ Structure 67 in file .gra /

RN 952720-98-8 CAPLUS
CN Acetamide, 2-[[3-cyano-5-oxo-4-(2-thienyl)-5H-indeno[1,2-b]pyridin-2-yl]thio]- (CA INDEX NAME)

/ Structure 68 in file .gra /

RN 952720-99-9 CAPLUS
CN Acetamide, 2-[[3-cyano-5-oxo-4-(2-thienyl)-5H-indeno[1,2-b]pyridin-2-yl]thio]-N-(4-methoxyphenyl)- (CA INDEX NAME)

/ Structure 69 in file .gra /

IT ***952720-93-3P*** ***952720-94-4P***
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)
(prepn., antibacterial and antifungal activity of indenopyridines, indenothienopyridines, and indenopyridinothienopyrimidines starting from indandione or (arylidene)indandiones using heterocyclization as key step)
RN 952720-93-3 CAPLUS
CN 5H-Indeno[1,2-b]pyridine-3-carbonitrile, 2-(methylthio)-5-oxo-4-(2-thienyl)- (CA INDEX NAME)

/ Structure 70 in file .gra /

RN 952720-94-4 CAPLUS
CN 5H-Indeno[1,2-b]pyridine-3-carbonitrile, 2-(ethylthio)-5-oxo-4-(2-thienyl)- (CA INDEX NAME)

/ Structure 71 in file .gra /

IT ***952720-96-6P***
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn., antibacterial and antifungal activity of indenopyridines, indenothienopyridines, and indenopyridinothienopyrimidines starting from indandione or (arylidene)indandiones using heterocyclization as key step)

RN 952720-96-6 CAPLUS
CN Acetamide, N-(4-chlorophenyl)-2-[[3-cyano-5-oxo-4-(2-thienyl)-5H-indeno[1,2-b]pyridin-2-yl]thio]- (CA INDEX NAME)

/ Structure 72 in file .gra /

IT ***952721-00-5P***
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn., antibacterial and antifungal activity of indenopyridines, indenothienopyridines, and indenopyridinothienopyrimidines starting from indandione or (arylidene)indandiones using heterocyclization as key step)
RN 952721-00-5 CAPLUS
CN 5H-Indeno[1,2-b]pyridine-3-carbonitrile, 5-oxo-2-[(phenylmethyl)thio]-4-(2-thienyl)- (CA INDEX NAME)

/ Structure 73 in file .gra /

REFERENCE COUNT: 13 THERE ARE 13 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L17 ANSWER 3 OF 11 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 2007:196524 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 147:419384
TITLE: New antimicrobial 9-(p-heterocyclo-substituted anilino)-tetrahydroacridines
AUTHOR(S): Ebeid, M. Y.; Kamel, M. M.; Nofal, Z. M.; Ragab, F.; Zaghary, W. A.; El-Kady, M.
CORPORATE SOURCE: Faculty of Pharmacy, Cairo University, Egypt
SOURCE: Egyptian Journal of Chemistry (2006), 49(2), 277-285
CODEN: EGJCA3; ISSN: 0449-2285
PUBLISHER: National Information and Documentation Centre
DOCUMENT TYPE: Journal
LANGUAGE: English
AB A new series of 9-[p-(4-aryl-3-cyano-2-iminopyridin-6-yl)anilino]-1,2,3,4-tetrahydroacridines and their 2-oxo-(or thioxo)-pyridinylanilino derivs. were synthesized and evaluated against ***bacteria*** and fungi. These compds. showed high significant activity against Saccharomyces cerevisiae, Bacillus subtilis, Staphylococcus aureus, Penicillium notatum, Aspergillus niger, Candida utilis, and Candida albicans.
IT ***951320-46-0P***
RL: PAC (Pharmacological activity); PRP (Properties); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)
(new antimicrobial 9-(p-heterocyclo-substituted anilino)-tetrahydroacridines)
RN 951320-46-0 CAPLUS
CN 3-Pyridinecarbonitrile, 1,2-dihydro-4-phenyl-6-[4-[(1,2,3,4-tetrahydro-9-acridinyl)amino]phenyl]-2-thioxo- (CA INDEX NAME)

/ Structure 74 in file .gra /

IT ***951320-47-1P*** ***951320-48-2P*** ***951320-49-3P***
RL: PRP (Properties); SPN (Synthetic preparation); PREP (Preparation)

(new antimicrobial 9-(p-heterocyclo-substituted anilino)-tetrahydroacridines)
RN 951320-47-1 CAPLUS
CN 3-Pyridinecarbonitrile, 1,2-dihydro-4-(3-methoxyphenyl)-6-[4-[(1,2,3,4-tetrahydro-9-acridinyl)amino]phenyl]-2-thioxo- (CA INDEX NAME)

/ Structure 75 in file .gra /

RN 951320-48-2 CAPLUS
CN 3-Pyridinecarbonitrile, 4-(3-chlorophenyl)-1,2-dihydro-6-[4-[(1,2,3,4-tetrahydro-9-acridinyl)amino]phenyl]-2-thioxo- (CA INDEX NAME)

/ Structure 76 in file .gra /

RN 951320-49-3 CAPLUS
CN 3-Pyridinecarbonitrile, 1,2-dihydro-6-[4-[(1,2,3,4-tetrahydro-9-acridinyl)amino]phenyl]-2-thioxo-4-(2,3,4-trimethoxyphenyl)- (CA INDEX NAME)

/ Structure 77 in file .gra /

IT ***951320-50-6***
RL: RCT (Reactant); RACT (Reactant or reagent)
(new antimicrobial 9-(p-heterocyclo-substituted anilino)-tetrahydroacridines)
RN 951320-50-6 CAPLUS
CN 3-Pyridinecarbonitrile, 4-[3-(dimethylamino)phenyl]-1,2-dihydro-6-[4-[(1,2,3,4-tetrahydro-9-acridinyl)amino]phenyl]-2-thioxo- (CA INDEX NAME)

/ Structure 78 in file .gra /

REFERENCE COUNT: 20 THERE ARE 20 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L17 ANSWER 4 OF 11 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 2003:971725 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 140:35893
TITLE: Transcription factor modulating compounds and methods of use thereof
INVENTOR(S): Levy, Stuart B.; Alekshun, Michael N.; Podlogar, Brent L.; Ohemeng, Kwasi; Verma, Atul K.; Warchol, Tadeusz; Bhatia, Beena
PATENT ASSIGNEE(S): USA
SOURCE: U.S. Pat. Appl. Publ., 301 pp.
CODEN: USXXCO
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 4
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 20030229065	A1	20031211	US 2002-139591	20020814

```
     CA 2445515           A1    20021104    CA 2002-2445515        20020506
     WO 2004001058        A2    20031231    WO 2002-US14255        20020506
     WO 2004001058        A3    20050303
         W:  AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN,
             CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH,
             GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR,
             LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH,
             PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ,
             UA, UG, US, UZ, VN, YU, ZA, ZM, ZW
         RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY,
             KG, KZ, MD, RU, TJ, TM, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB,
             GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA,
             GN, GQ, GW, ML, MR, NE, SN, TD, TG
     AU 2002367953        A1    20040106    AU 2002-367953         20020506
     AU 2002367953        B2    20080717
     EP 1524974           A2    20050427    EP 2002-807554         20020506
         R:  AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT,
             IE, SI, LT, LV, FI, RO, MK, CY, AL, TR
     JP 2005519998        T     20050707    JP 2004-515557         20020506
     US 20050124678       A1    20050609    US 2003-700661         20031103
     US 7405235           B2    20080729
     AU 2008203017        A1    20080731    AU 2008-203017         20080708
PRIORITY APPLN. INFO.:                      US 2001-288660P     P  20010504
                                            AU 2002-367953      A3 20020506
                                            WO 2002-US14255     W  20020506
                                            US 2002-139591      A2 20020814
                                            US 2002-423319P     P  20021101
                                            US 2002-425916P     P  20021113

OTHER SOURCE(S):         MARPAT 140:35893
AB   Methods for identifying compd. useful as anti-infectives that decrease
     resistance, virulence, or growth of microbes are provided.  In one
     embodiment, the method comprises contacting a microbial cell comprising:
     (1) a selectable marker under the control of a transcription factor
     responsive element and (2) a transcription factor, with a compd. under
     conditions which allow interaction of the compd. with the microbial cell;
     and measuring the ability of the compd. to affect the growth or survival
     of the microbial cell as an indication of whether the test compd.
     modulates the activity of a transcription factor.
IT     ***221179-01-7***     ***299198-34-8***
     RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL
     (Biological study); USES (Uses)
        (transcription factor modulating compds. as anti-infectives agents that
        decrease resistance and virulence and growth identified by detg. marker
        under control of responsive element)
RN   221179-01-7  CAPLUS
CN   3,5-Pyridinedicarbonitrile, 2-amino-4-(4-hydroxyphenyl)-6-[[2-oxo-2-(2-oxo-
     2H-1-benzopyran-3-yl)ethyl]thio]-  (CA INDEX NAME)


/ Structure 79 in file .gra /

RN   299198-34-8  CAPLUS
CN   3-Pyridinecarbonitrile, 2-[(2-cyclopropyl-2-oxoethyl)thio]-6-(2-thienyl)-4-
     (trifluoromethyl)-  (CA INDEX NAME)


/ Structure 80 in file .gra /
```

L17 ANSWER 5 OF 11 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 2003:912358 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 139:381381
TITLE: Preparation of antibacterial pyridinedicarbonitriles
INVENTOR(S): Grant, Richard; Latham, Christopher J.; Thomson, Samantha; Zhao, Lihua
PATENT ASSIGNEE(S): Pantherix Ltd., UK
SOURCE: Brit. UK Pat. Appl., 18 pp.
CODEN: BAXXDU
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
GB 2388593	A	20031119	GB 2002-10898	20020513
PRIORITY APPLN. INFO.:			GB 2002-10898	20020513

OTHER SOURCE(S): MARPAT 139:381381
GI

/ Structure 81 in file .gra /

AB The title compds. [I; n = 0-2; R1 = H, alkyl, CN, aryl, etc.] which have antibacterial activity, esp. against gram pos. ***bacteria*** , were prepd. Thus, reacting 2-amino-3,5-dicyano-6-mercaptopyridine with 2-chloro-N-(2,5-dimethylphenyl)acetamide in the presence of K2CO3 in DMF afforded 19% I [n = 0; R1 = 2,5-Me2C6H3] which showed IC50 in the range of 1-50 .mu.M against isolated Streptococcus pneumoniae chorismate synthase. Pharmaceutical compn. comprising the compd. I is claimed.

IT ***298216-30-5P*** ***303065-59-0P*** ***303065-61-4P***
303065-63-6P ***311314-38-2P*** ***311314-61-1P***
311332-03-3P ***311789-13-6P*** ***311795-13-8P***
312318-88-0P ***312509-66-3P*** ***312513-87-4P***
312513-88-5P ***318258-92-3P*** ***329206-96-4P***
331421-74-0P ***331966-90-6P*** ***331966-91-7P***
331966-98-4P ***332114-15-5P*** ***337918-65-7P***
337918-66-8P ***337926-03-1P*** , Acetamide,N,N'-(9H-fluoren-9-ylidenedi-4,1-phenylene)bis[2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-
339153-44-5P ***339576-16-8P*** ***339584-40-6P***
348146-19-0P ***348580-92-7P*** ***348581-11-3P***
356589-29-2P ***356589-40-7P*** ***356589-45-2P***
356589-52-1P ***356589-54-3P*** ***356589-62-3P***
356589-71-4P ***400864-06-4P*** ***625109-52-6P***
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of antibacterial pyridinedicarbonitriles)

RN 298216-30-5 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(2-cyanophenyl)- (CA INDEX NAME)

/ Structure 82 in file .gra /

RN 303065-59-0 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(2,6-dimethylphenyl)- (CA INDEX NAME)

/ Structure 83 in file .gra /

RN 303065-61-4 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(2-methylphenyl)- (CA INDEX NAME)

/ Structure 84 in file .gra /

RN 303065-63-6 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(3-methylphenyl)- (CA INDEX NAME)

/ Structure 85 in file .gra /

RN 311314-38-2 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(2-bromophenyl)- (CA INDEX NAME)

/ Structure 86 in file .gra /

RN 311314-61-1 CAPLUS
CN Acetamide, N,N'-(3,3'-dimethoxy[1,1'-biphenyl]-4,4'-diyl)bis[2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]- (9CI) (CA INDEX NAME)

/ Structure 87 in file .gra /

RN 311332-03-3 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(3-methoxyphenyl)- (CA INDEX NAME)

/ Structure 88 in file .gra /

RN 311789-13-6 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N,N-diphenyl- (CA INDEX NAME)

/ Structure 89 in file .gra /

RN 311795-13-8 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-[3-(trifluoromethyl)phenyl]- (CA INDEX NAME)

/ Structure 90 in file .gra /

RN 312318-88-0 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(4-butoxyphenyl)-
(CA INDEX NAME)

/ Structure 91 in file .gra /

RN 312509-66-3 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(2,5-
dimethylphenyl)- (CA INDEX NAME)

/ Structure 92 in file .gra /

RN 312513-87-4 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(2-ethoxyphenyl)-
(CA INDEX NAME)

/ Structure 93 in file .gra /

RN 312513-88-5 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(4-ethoxyphenyl)-
(CA INDEX NAME)

/ Structure 94 in file .gra /

RN 318258-92-3 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-phenyl- (CA INDEX
NAME)

/ Structure 95 in file .gra /

RN 329206-96-4 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(4-bromophenyl)-
(CA INDEX NAME)

/ Structure 96 in file .gra /

RN 331421-74-0 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(4-cyanophenyl)-
(CA INDEX NAME)

/ Structure 97 in file .gra /

RN 331966-90-6 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(4-methoxyphenyl)-
(CA INDEX NAME)

/ Structure 98 in file .gra /

RN 331966-91-7 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(2-methoxyphenyl)-
(CA INDEX NAME)

/ Structure 99 in file .gra /

RN 331966-98-4 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(2-fluorophenyl)-
(CA INDEX NAME)

/ Structure 100 in file .gra /

RN 332114-15-5 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-[4-
(aminosulfonyl)phenyl]- (CA INDEX NAME)

/ Structure 101 in file .gra /

RN 337918-65-7 CAPLUS
CN Acetamide, N,N'-1,4-phenylenebis[2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-
(CA INDEX NAME)

/ Structure 102 in file .gra /

RN 337918-66-8 CAPLUS
CN Acetamide, N,N'-(2-chloro-1,4-phenylene)bis[2-[(6-amino-3,5-dicyano-2-
pyridinyl)thio]- (CA INDEX NAME)

/ Structure 103 in file .gra /

RN 337926-03-1 CAPLUS
CN Acetamide, N,N'-(9H-fluoren-9-ylidenedi-4,1-phenylene)bis[2-[(6-amino-3,5-
dicyano-2-pyridinyl)thio]- (9CI) (CA INDEX NAME)

/ Structure 104 in file .gra /

RN 339153-44-5 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(4-chlorophenyl)-
(CA INDEX NAME)

/ Structure 105 in file .gra /

RN 339576-16-8 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(4-methylphenyl)-
(CA INDEX NAME)

/ Structure 106 in file .gra /

RN 339584-40-6 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(4-methoxy-2-nitrophenyl)- (CA INDEX NAME)

/ Structure 107 in file .gra /

RN 348146-19-0 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-[4-[(2-thiazolylamino)sulfonyl]phenyl]- (CA INDEX NAME)

/ Structure 108 in file .gra /

RN 348580-92-7 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(3,4-dichlorophenyl)- (CA INDEX NAME)

/ Structure 109 in file .gra /

RN 348581-11-3 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(2,6-dichlorophenyl)- (CA INDEX NAME)

/ Structure 110 in file .gra /

RN 356589-29-2 CAPLUS
CN Acetamide, N-[4-(acetylamino)phenyl]-2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]- (CA INDEX NAME)

/ Structure 111 in file .gra /

RN 356589-40-7 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-[4-(methylthio)phenyl]- (CA INDEX NAME)

/ Structure 112 in file .gra /

RN 356589-45-2 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(9,10-dihydro-9,10-dioxo-2-anthracenyl)- (CA INDEX NAME)

/ Structure 113 in file .gra /

RN 356589-52-1 CAPLUS
CN Benzoic acid, 4-[[2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]acetyl]amino]- (CA INDEX NAME)

/ Structure 114 in file .gra /

RN 356589-54-3 CAPLUS

CN Benzoic acid, 3-[[2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]acetyl]amino]- (CA INDEX NAME)

/ Structure 115 in file .gra /

RN 356589-62-3 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-[2-chloro-5-(trifluoromethyl)phenyl]- (CA INDEX NAME)

/ Structure 116 in file .gra /

RN 356589-71-4 CAPLUS
CN Benzoic acid, 5-[[2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]acetyl]amino]-2-chloro- (CA INDEX NAME)

/ Structure 117 in file .gra /

RN 400864-06-4 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-2-naphthalenyl- (CA INDEX NAME)

/ Structure 118 in file .gra /

RN 625109-52-6 CAPLUS
CN Acetamide, 2-[(6-amino-3,5-dicyano-2-pyridinyl)thio]-N-(3,4-dimethylphenyl)- (CA INDEX NAME)

/ Structure 119 in file .gra /

IT ***111971-56-3***
RL: RCT (Reactant); RACT (Reactant or reagent)
(prepn. of antibacterial pyridinedicarbonitriles)
RN 111971-56-3 CAPLUS
CN 3,5-Pyridinedicarbonitrile, 6-amino-1,2-dihydro-2-thioxo- (CA INDEX NAME)

/ Structure 120 in file .gra /

REFERENCE COUNT: 2 THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L17 ANSWER 6 OF 11 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 2003:145365 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 139:270296
TITLE: Novel 4-aminopyrimido[4,5-b]quinoline derivatives as potential antimicrobial agents
AUTHOR(S): El-Sayed, Ola A.; El-Bieh, Fatma M.; El-Aqeel, Shada I.; Al-Bassam, Badr A.; Hussein, Maher E.
CORPORATE SOURCE: Pharmaceutical Chemistry Department, Faculty of Pharmacy, University of Alexandria, Alexandria, 21521, Egypt
SOURCE: Bollettino Chimico Farmaceutico (2002), 141(6),

461-465
CODEN: BCFAAI; ISSN: 0006-6648
PUBLISHER: Societa Editoriale Farmaceutica
DOCUMENT TYPE: Journal
LANGUAGE: English
GI

/ Structure 121 in file .gra /

AB Two series of 4-aminopyrimido[4,5-b]quinoline derivs. substituted in the 2-position , e.g. I, and/or in 1-position, e.g. II, have been prepd. by facile routes starting from 2-amino-3-cyanoquinoline 2,2-chloro-3-cyanoquinoline, and 2-arylamino-3-cyanoquinolines. The reactions involved simple fusion with thiourea or urea and, in some cases, with guanidine. The prepd. compds. were in vitro tested for antimicrobial activities against some selected Gram-pos., Gram-neg. ***bacteria*** and fungi. Products contg. the thio-function were the most active followed by those contg. the imino-function while the carbonyl contg. derivs. were without significant antimicrobial effect.

IT ***69513-35-5P***
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. and properties of)

RN 69513-35-5 CAPLUS

CN 3-Quinolinecarbonitrile, 1,2-dihydro-2-thioxo- (CA INDEX NAME)

/ Structure 122 in file .gra /

REFERENCE COUNT: 26 THERE ARE 26 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L17 ANSWER 7 OF 11 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 1999:221628 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 130:325083
TITLE: Synthesis and antimicrobial activity of some new 4-methylquinolines
AUTHOR(S): Kamel, M. M.; Fathala, O. A.; Abdou, W. A. M.; Haiba, M. E.
CORPORATE SOURCE: Medicinal Chemistry Department, National Research Centre, Cairo, Egypt
SOURCE: Proceedings of the Pakistan Academy of Sciences (1997), 34(1), 7-11
CODEN: PKSPAW; ISSN: 0377-2969
PUBLISHER: Pakistan Academy of Sciences
DOCUMENT TYPE: Journal
LANGUAGE: English

AB Some new 4,8-dimethyl-2-[p-(3-cyano-2-thioxo-4-arylpyridine-6-yl)]anilinoquinolines and 7-chloro-4-methyl-2-(4-hydroxy)anilinoquinoline Mannich bases were synthesized for the purpose of antimicrobial evaluation against ***bacteria*** , yeast, and fungi. Two compds. showed activity against these microorganisms.

IT ***218272-67-4P*** ***218272-68-5P*** ***218272-69-6P***
218272-70-9P ***223697-02-7P***
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use);

BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. of methylquinolines as antibacterial and antifungal agents)
RN 218272-67-4 CAPLUS
CN 3-Pyridinecarbonitrile, 6-[4-[(4,8-dimethyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-4-(4-methoxyphenyl)-2-thioxo- (CA INDEX NAME)

/ Structure 123 in file .gra /

RN 218272-68-5 CAPLUS
CN 3-Pyridinecarbonitrile, 4-[4-(dimethylamino)phenyl]-6-[4-[(4,8-dimethyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-2-thioxo- (CA INDEX NAME)

/ Structure 124 in file .gra /

RN 218272-69-6 CAPLUS
CN 3-Pyridinecarbonitrile, 6-[4-[(4,8-dimethyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-4-(3-methoxy-2-nitrophenyl)-2-thioxo- (CA INDEX NAME)

/ Structure 125 in file .gra /

RN 218272-70-9 CAPLUS
CN 3-Pyridinecarbonitrile, 6-[4-[(4,8-dimethyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-4-(2-thienyl)-2-thioxo- (CA INDEX NAME)

/ Structure 126 in file .gra /

RN 223697-02-7 CAPLUS
CN 3-Pyridinecarbonitrile, 6-[4-[(7-chloro-4-methyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-4-(4-methoxyphenyl)-2-thioxo- (CA INDEX NAME)

/ Structure 127 in file .gra /

REFERENCE COUNT: 17 THERE ARE 17 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L17 ANSWER 8 OF 11 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 1998:702455 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 130:66375
TITLE: Synthesis of some new 4-methylquinolines of possible biological activity
AUTHOR(S): Kamel, M. M.; Fathalla, O. A.; Abdou, W. A. M.; Omer, M. T.; Haiba, M. E.
CORPORATE SOURCE: Medicinal Chemistry Department, National Research Centre, Cairo, Egypt
SOURCE: Egyptian Journal of Pharmaceutical Sciences (1998), Volume Date 1997, 38(1-3), 79-86
CODEN: EJPSBZ; ISSN: 0301-5068
PUBLISHER: National Information and Documentation Centre
DOCUMENT TYPE: Journal
LANGUAGE: English
AB Some new 4,8-dimethyl-2-[p-(3-cyano-2-thioxo-4-arylpyridin-6-

yl)]anilinoquinolines and 7-chloro-4-methyl-2-(4-hydroxy)anilinoquinolines Mannich bases were synthesized for the purpose of antimicrobial evaluation against ***bacteria*** , yeast, and fungi. 7-Chloro-4-methyl-2-[4-hydroxy-3,5-di(diethylaminomethyl)]anilinoquinoline showed fungicidal activity against Aspergillus niger.

IT ***218272-67-4P*** ***218272-68-5P*** ***218272-69-6P*** ***218272-70-9P***
RL: SPN (Synthetic preparation); PREP (Preparation)
(synthesis and antimicrobial activity of 4-methylquinolines)

RN 218272-67-4 CAPLUS
CN 3-Pyridinecarbonitrile, 6-[4-[(4,8-dimethyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-4-(4-methoxyphenyl)-2-thioxo- (CA INDEX NAME)

/ Structure 128 in file .gra /

RN 218272-68-5 CAPLUS
CN 3-Pyridinecarbonitrile, 4-[4-(dimethylamino)phenyl]-6-[4-[(4,8-dimethyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-2-thioxo- (CA INDEX NAME)

/ Structure 129 in file .gra /

RN 218272-69-6 CAPLUS
CN 3-Pyridinecarbonitrile, 6-[4-[(4,8-dimethyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-4-(3-methoxy-2-nitrophenyl)-2-thioxo- (CA INDEX NAME)

/ Structure 130 in file .gra /

RN 218272-70-9 CAPLUS
CN 3-Pyridinecarbonitrile, 6-[4-[(4,8-dimethyl-2-quinolinyl)amino]phenyl]-1,2-dihydro-4-(2-thienyl)-2-thioxo- (CA INDEX NAME)

/ Structure 131 in file .gra /

REFERENCE COUNT: 15 THERE ARE 15 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L17 ANSWER 9 OF 11 CAPLUS
ACCESSION NUMBER: 1998:702449 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 130:81446
TITLE: Synthesis of some new indole derivatives of possible antimicrobial activity
AUTHOR(S): Fahmy, H. H.; Kassem, E. M. M.; Abdou, W. A. M.; Mahmoud, S. A.
CORPORATE SOURCE: Department of Medicinal Chemistry, National Research Centre, Cairo, Egypt
SOURCE: Egyptian Journal of Pharmaceutical Sciences (1998), Volume Date 1997, 38(1-3), 13-22
CODEN: EJPSBZ; ISSN: 0301-5068
PUBLISHER: National Information and Documentation Centre
DOCUMENT TYPE: Journal
LANGUAGE: English
AB A series of indolyl arylidene hydrazones, indolylamidothiazolidin-4-ones, pyrazoline and pyrazolidindione derivs., 3-(3-cyano-4-aryl-2-imino-(1H)-

pyridin-6-yl)-indoles and 3-(3-cyano-4-aryl-2-thioxo-(1H)-pyridin-6-yl)-indoles were synthesized. Some of the new compds. showed considerable antimicrobial activity against gram + ve ***bacteria*** , yeast and fungi.

IT ***218784-55-5P*** ***218784-56-6P*** ***218784-57-7P***
218784-58-8P ***218784-59-9P***
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(synthesis of new indole derivs. of possible antimicrobial activity)

RN 218784-55-5 CAPLUS
CN 3-Pyridinecarbonitrile, 1,2-dihydro-6-(1H-indol-3-yl)-4-phenyl-2-thioxo- (CA INDEX NAME)

/ Structure 132 in file .gra /

RN 218784-56-6 CAPLUS
CN 3-Pyridinecarbonitrile, 1,2-dihydro-6-(1H-indol-3-yl)-4-(4-methoxyphenyl)-2-thioxo- (CA INDEX NAME)

/ Structure 133 in file .gra /

RN 218784-57-7 CAPLUS
CN 3-Pyridinecarbonitrile, 4-(4-chlorophenyl)-1,2-dihydro-6-(1H-indol-3-yl)-2-thioxo- (CA INDEX NAME)

/ Structure 134 in file .gra /

RN 218784-58-8 CAPLUS
CN 3-Pyridinecarbonitrile, 4-[4-(dimethylamino)phenyl]-1,2-dihydro-6-(1H-indol-3-yl)-2-thioxo- (CA INDEX NAME)

/ Structure 135 in file .gra /

RN 218784-59-9 CAPLUS
CN 3-Pyridinecarbonitrile, 1,2-dihydro-6-(1H-indol-3-yl)-2-thioxo-4-(3,4,5-trimethoxyphenyl)- (CA INDEX NAME)

/ Structure 136 in file .gra /

REFERENCE COUNT: 16 THERE ARE 16 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L17 ANSWER 10 OF 11 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 1994:134144 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 120:134144
ORIGINAL REFERENCE NO.: 120:23615a,23618a
TITLE: Preparation of cephalosporin derivatives as antibacterial agents
INVENTOR(S): Tanaka, Kyoshi; Sutani, Mineichi; Komatsu, Miwako; Tsuchida, Keiichi; Saito, Akito; Hayashi, Kazuya; Kanna, Hiroshi; Yonezawa, Kenji; Minami, Shinzaburo;

Watanabe, Yasuo
PATENT ASSIGNEE(S): Toyama Chemical Co Ltd, Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 26 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 05202065	A	19930810	JP 1991-311552	19911031
JP 05262777	A	19931012	JP 1991-343936	19911202
JP 3141041	B2	20010305		

PRIORITY APPLN. INFO.: JP 1991-311552 A1 19911031
OTHER SOURCE(S): MARPAT 120:134144
GI

/ Structure 137 in file .gra /

AB The title .beta.-lactams [I; R1 = (un)protected NH2; R2 = (cyano-, carbamoyl-, or halo-substituted) alkyl, alkenyl, alkynyl, or cycloalkyl; R3 = (un)protected CO2H, CO2-; R4 = H, (un)protected NH2; A = CH, CX; X = halo; B = bond, CH2NH, alkylene or O-lower alkylene optionally substituted with (un)protected hydroxy; D = NR5R6; R5 = H, H2N-protecting group; R6 = H, (cyano-, carbamoyl-, or halo-substituted) alkyl, alkenyl, aryl, or cycloalkyl; B-D = (halo)alkoxy; n = 0,1], having potent antibacterial activity against gram pos. ***bacteria*** including methicillin-resistant Staphylococcus aureus strains, are prepd. Thus, quaternization of 3-tert-butoxylcarbonylaminothieno[2,3-b]pyridine by p-methoxybenzyl 3-iodomethyl-7-[(Z)-2-methoxyimino-2-(2-tritylaminothiazol-4-yl)acetamido]-3-cephem-4-carboxylate in DMF at room temp. followed by deprotection with CF3CO2H in anisole gave 7-[2-(2-aminothiazol-4-yl)-(Z)-2-methoxyiminoacetamido]-3-(3-amino-7-thieno[2,3-b]pyridinio)methyl-3-cephem-4-carboxylate (II). II showed min. inhibitory concn. of 1.56, 12.5, .ltoreq.0.1, and 1.56 .mu.g/mL against .beta.-lactamase-producing Staphylococcus aureus F-137, methicillin-resistant S. aureus F-597, Escherichia coli NIHJ JC-2, and Pseudomonas aeruginosa IFO 3445, resp. A total of 32 I were prepd.
IT ***152939-11-2P*** ***152939-12-3P***
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. of, as intermediate for antibacterial cephalosporin deriv.)
RN 152939-11-2 CAPLUS
CN Acetic acid, 2-[(3-cyano-5-nitro-2-pyridinyl)thio]-, methyl ester (CA INDEX NAME)

/ Structure 138 in file .gra /

RN 152939-12-3 CAPLUS
CN Acetic acid, 2-[(5-amino-3-cyano-2-pyridinyl)thio]-, methyl ester (CA INDEX NAME)

/ Structure 139 in file .gra /

L17 ANSWER 11 OF 11 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 1986:514821 CAPLUS <<LOGINID::20080908>>
DOCUMENT NUMBER: 105:114821
ORIGINAL REFERENCE NO.: 105:18579a,18582a
TITLE: 2-(2-Aminothiazol-4-yl)-2-alkoxyiminoacetic acid derivatives substituted on the oxime
INVENTOR(S): Heymes, Rene; Vignau, Michel
PATENT ASSIGNEE(S): Roussel-UCLAF , Fr.
SOURCE: Fr. Demande, 66 pp. Addn. to Fr. Demande Appl. No. 78 09617.
CODEN: FRXXBL
DOCUMENT TYPE: Patent
LANGUAGE: French
FAMILY ACC. NUM. COUNT: 3
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.		DATE
FR 2553770	A2	19850426	FR 1983-16698		19831020
FR 2553770	B2	19860314			
FR 2438050	A2	19800430	FR 1978-24563		19780824
FR 2438050	B2	19830415			
AT 8100043	A	19821115	AT 1981-43		19810108
AT 371472	B	19830627			
US 4439433	A	19840327	US 1981-267638		19810527
GB 2101117	A	19830112	GB 1981-34540		19811117
GB 2101117	B	19830602			
CH 642648	A5	19840430	CH 1983-1949		19830411
PRIORITY APPLN. INFO.:			FR 1978-24563		19780824
			FR 1978-9617	A	19780331
			AT 1979-2403	A	19790330
			CH 1979-3008	A	19790330
			GB 1979-11275	A	19790330
			US 1979-25666	A3	19790330

OTHER SOURCE(S): CASREACT 105:114821; MARPAT 105:114821
GI

/ Structure 140 in file .gra /

AB 2-(2-Aminothiazol-4-yl)-2-alkoxyiminoacetic acid derivs. I [R = CXR2 (X = O, S; R2 = alkyl, alkoxy, Ph, substituted amino, substituted carboxyl, etc.,); R1 = Cl, OMe, alkyl, cycloalkyl, alkylthio, acetoxymethyl, carbamoyloxymethyl, etc.; A = H, alk. metal, alk. earth metal, etc.], having good activity against gram-pos. ***bacteria*** (for example, the MIC for penicillin-resistant Staphylococcus was 1 .mu.g/mL after 24 and 48 h), are prepd. Thus, syn-2-[(2-bromoethoxy)imino]-2-(2-tritylaminothiazol-4-yl)acetic acid [prepd. in 2 steps from Et 2-hydroxyimino-2-(2-tritylamino-4-thiazolyl)acetate-HCl] was acylated with tert-Bu 7-aminocephalosporanate to give tert-Bu 3-acetoxymethyl-7-[[2-(2-tritylaminothiazol-4-yl)-2-[2-bromoethoxy)imino]acetyl]amino]ceph-3-em-4-carboxylate (II). II was then deprotected and converted to the trifluoroacetate of syn-3-acetoxymethyl-7-[[2-(2-aminothiazol-4-yl)-2-[(2-bromoethoxy)imino]acetyl]amino]ceph-3-em-4-carboxylic acid.

IT ***72697-85-9P***
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. and deblocking of)
RN 72697-85-9 CAPLUS
CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid, 3-[(acetyloxy)methyl]-7-[[[[2-[(3-cyano-6-methyl-2-pyridinyl)thio]ethoxy]imino][2-[(triphenylmethyl)amino]-4-thiazolyl]acetyl]amino]-8-oxo-, [6R-[6.alpha.,7.beta.(Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

/ Structure 141 in file .gra /

IT ***72697-31-5P*** ***72697-32-6P***
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)
(prepn. of, as antibiotic)
RN 72697-31-5 CAPLUS
CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid, 3-[(acetyloxy)methyl]-7-[[(2-amino-4-thiazolyl)[[2-[(3-cyano-6-methyl-2-pyridinyl)thio]ethoxy]imino]acetyl]amino]-8-oxo-, [6R-[6.alpha.,7.beta.(Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

/ Structure 142 in file .gra /

RN 72697-32-6 CAPLUS
CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid, 3-[(acetyloxy)methyl]-7-[[(2-amino-4-thiazolyl)[[2-[(3-cyano-6-methyl-2-pyridinyl)thio]ethoxy]imino]acetyl]amino]-8-oxo-, monosodium salt, [6R-[6.alpha.,7.beta.(Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

/ Structure 143 in file .gra /

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